

2

RELATIONS WITH THE STAKEHOLDERS





CUSTOMERS AND THE COMMUNITY

SCOPE

Data pertaining to the volume of customers, apart from the Companies Acea Energia, Areti, and, in the water segment, to the Companies Acea Ato 2, Acea Ato 5, Gesesa, GORI and AdF also includes data related to Umbria Energy and other water Companies (Acque, Publiacqua, AdF and Umbra Acque) – that are not included in the NFS scope – highlighting the single contribution for the

sole purpose of providing a “global” dimension. Data pertaining to perceived quality, delivered quality, tariffs, customer care and communication activities relates to the operating Companies – Acea Energia, Areti, Acea Ato 2, Acea Ato 5, Gesesa, GORI and AdF – and the Parent Company – as recalled in the text.

ACEA GROUP CUSTOMERS: ELECTRICITY AND WATER SERVICES



Over
1.4
million customers
for energy and gas



Over
1.6
million withdrawal
points for
electricity
distribution



About **2.7**
million water user
accounts
(of which around
907,500 in Lazio),
serving
8.5 million
residents
(4.2 million in Lazio)



Social bonuses
for electricity, gas and
water (national and local)
have respectively provided
savings of **€ 8.8** and
€ 2.4 million for the
entitled customers/users

According to the latest data from the Regulation Authority for Energy, Networks and the Environment (ARERA)⁴¹, **Acea Energia** is Italy's **seventh** largest operator in terms of volumes of electricity sold on the final market, an improvement of 3 positions from its previous position and **third**, with a 3.3% market share, for **energy sold to families** (“domestic customers”). The company also confirmed its position as **Italy's second largest operator** in terms of volumes sold to customers of the **standard market service**, with a market share of 5.4%, and became **eleventh** in terms of volumes sold to the **free market**, with a share of 2.3% (it was sixteenth in the previous survey, with a share of 1.9%).

The contracts managed by the Group for electricity and gas (free market and standard market service⁴²), as at 31/12/2021, are **more**

than 1,416,000, with an increase compared to the 2020 figure (+2%), which concerned all types of customers in the free market segment (see table No. 15).

Areti, holder of the ministerial concession for the **distribution of electricity** in the territory of Rome and Formello, is **Italy's third largest operator** in terms of **volumes of energy distributed**, with 3.6% of the market share (4.7% in the “domestic” and 3.3% in the “non-domestic”) market and **Italy's second largest operator** in terms of **withdrawal points**⁴³. As at 31/12/2021, it manages **1,640,461 withdrawal points**. The growth of the customer base, which generally shows slight increases or decreases, is due both to urban expansion and disposals resulting, for example, from discontinued operations (see Table No. 15).

⁴¹ See the *Annual report on the status of services and activities carried out*, 2021 edition (on 2020 data), *Structure, pricing and quality in the electricity sector*, available online on the website of the Authority (ARERA).

⁴² The relevant national Authority accurately defines the energy market segments. See the ARERA website.

⁴³ See the *Annual report on the status of services and activities carried out*, 2021 edition (on 2020 data), *Structure, pricing and quality in the electricity sector*, available online on the ARERA website.

PROSUMERS CONNECTED TO ACEA'S NETWORKS: GROWTH TREND CONFIRMED IN 2021

A prosumer is at the same time a **producer and consumer of energy**; it partially or totally ensures its own energy supply and transfers any surplus produced to the grid. In the **new energy model**, prosumers play **an increasingly consolidated and widespread role**, interacting with both the distributor and the entity in charge of selling/collecting energy. **Acea responds adequately to the evolution of the energy model**, by developing the capacity of connection, transmission and distribution systems.

At 31/12/2021, there were **15,786 prosumers** active on the energy distribution network managed by Areti: this **figure**, compared to the

14,641 prosumers recorded in 2020, **confirms an annual growth trend of around 8%**, the same percentage increase already recorded between 2020 and 2019. **The largest number of prosumers (13,019) are qualified as "domestic prosumers"**, i.e. customers with residential user contracts who are also small-scale energy producers, **and 2,767 are qualified as "other uses"**, i.e. non-domestic users (businesses, professional firms and artisans). **About 9,000** of the prosumers on the Acea network **are fed Acea Energia customers. The energy fed into the grid** by these entities in 2021 is **84.43 GWh**, of which **about 75% is from photovoltaic sources**.

USERS OF THE SOCIAL ELECTRICITY AND GAS BONUS: WHAT'S NEW IN 2021

With regard to the disbursement of the **social electricity and gas bonus** provided for customers **with economic difficulties** and for customers who, due to their **state of health**, require energy-intensive medical equipment, **it is worth noting the intervening evolution of the legislation** (Decree-Law No. 124 of 26 October 2019, converted with amendments by Law No. 157 of 19 December 2019) according to which, **as of 1 January 2021**, while the bonus for physical hardship continues to be managed by municipalities and/or CAFs, **social bonuses for economic hardship are automatically recognised to citizens/households which are entitled to them**. In order to obtain the bonus for economic hardship, it is sufficient to request the ISEE certificate; if the household meets the conditions that entitle it to the bonus, INPS, in compliance with privacy regulations, sends the necessary data to the Integrated Information System (IIS), managed by Acquirente Unico company, which cross-checks the data received with those relating to electricity supplies, enabling the automatic payment of the bonus to those entitled. This development has led to **a significant increase in the number of bonus beneficiaries (electricity and gas)**.

In 2021 the **number of Acea Energia customers eligible for the electricity bonus**, in the protected and free markets, **was 57,644⁴⁴**

(the figure in 2020 was 26,053 customers accepted), who benefited from overall economic savings of almost € 7.4 million. In particular, 56,914 bonuses were paid for economic hardship (99% of the total) and 828 for physical hardship (state of health), making a total of 57,742, which is higher than the number of beneficiary customers as one customer may be entitled to both bonuses. Similarly to the electricity bonus, ARERA provides for the **"GAS bonus"**, with similar procedures. **The number of customers eligible for this bonus in 2021 was 19,147**, representing savings exceeding **€ 1.4 million**.

Overall, during the year, **the bonus system (both electricity and gas) resulted in savings of around € 8.8 million for Acea Energia customers who benefited from it**.

In the area served by the **distribution network** managed by Areti, in 2021 there will be **a total of 91,796 customers eligible for the electricity bonus** (90,664 for economic hardship, 1,132 for physical hardship); this figure, which refers to customers served, for the "sales" component, by companies other than Acea Energia, has undergone an exceptional increase (those eligible for the bonus were 11,649 in 2020), following the automatic mechanism introduced by the above-mentioned legislation.

Acea is also **Italy's leading integrated water service operator** (catchment, supply, purification, wastewater collection and treatment) in terms of population covered, with **approximately 2.7 million connected users** and an overall base consisting of **8.5 million inhabitants in Italy** (see Table no. 15). Within the area of Rome and province alone, managed by Acea Ato 2, there are **over 705,000 users** and a served population equal to about **3.7 million people**. Starting from this area – Ato 2-Central Lazio – over time the

Group has expanded its activities, becoming the reference operator also in the province of Frosinone (Lazio), in the provinces of Pisa, Florence, Siena, Grosseto, Arezzo and Lucca (Tuscany), in the areas from the Sorrento peninsula to the areas around Vesuvius in the provinces of Naples and Salerno and the province of Benevento (Campania) and Perugia and Terni (Umbria). Moreover, the Group operates in a number of South American countries.

⁴⁴ For customers with financial hardship and health problems reference is made to the number of customers who benefited from the bonus at least once during the year.

THE APPLICATION PROCESS OF THE NATIONAL SOCIAL WATER BONUS

The **social water bonus**, implemented by the Authority since 2017 with the approval of the application methods (TIBSI)⁴⁵, **provides for a discount for the supply of water to domestic users under ascertained socio-economic hardship**, based on specific thresholds of the ISEE indicator. The bonus is calculated by each operator according to family numbers (per capita basis), applying the discounted tariff to the quantity of water required to satisfy the protected amount (about 50 litres/inhabitant/day). **Area Governing Bodies may introduce or confirm further measures of protection** for users in financially vulnerable conditions, granting a local “**supplementary water bonus**”.

As of 1 January 2021, national water bonuses for economic hardship **are granted automatically to citizens/family units who are entitled to them**, without requiring submission of an application (pursuant to Decree Law No. 124 of 26 October 2019, converted with amendments by Law No. 157 of 19 December 2019). With Resolution 11/2020 - DACU (Consumer and User Advocacy Directorate) of 29 December 2020, ARERA **approved the provisions for managing the transition period to the new system of automatic recognition of social bonuses for economic hardship, as well as the**

application methods (Resolution 63/2021/R/com, subsequently amended and supplemented by Resolution 257/2021/R/com). As far as the water bonus is concerned, the resolution regulates the activities that fall within the competence of the concerned territorial water manager, with reference, among other things, to the procedures for **identifying the water supplies to be facilitated**, the **criteria for quantifying the bonus** and the **procedures for its subsequent payment to those entitled to it**. The process of automatic recognition of the bonus is based on the **exchange of information flows between the Water Operator and Acquirente Unico SpA**, in its capacity as manager of the Integrated Information System (IIS) which, in turn, **receives some of the necessary data from INPS**. With the subsequent Resolution 366/2021/R/com, ARERA assigned responsibility for the processing of personal data functional to the activities of identifying users and payment of the bonus to the Operators. The procedure for appointing the Operators as **personal data** controllers is currently being finalised, at the end of which Acquirente Unico will be able to **transmit to the Operators the information received from INPS regarding the data of the entitled persons**, thus starting the automatic recognition system.

NATIONAL AND INTEGRATED WATER BONUS USERS FOR ACEA GROUP COMPANIES

In 2021, with the support of the Parent Company's Communication Department, the water companies also carried out information campaigns on the water bonus aimed at users (see also the section on *Communication, events and solidarity*). **Acea Ato 2**, which also recognises **on a local basis the supplementary water bonus** approved by its own Area Governing Body, **has also given ample visibility to the issue on its customer communication channels** (dedicated page on its website, information on bills, etc.).

With regard to the **2021 data** relating to customers entitled to the **national water bonus**, it should be kept in mind that, **where possible, they have only been partially accounted for and for the first few months of the year**; this situation, which applies to all Operators, occurred because the application **of the system for automatic recognition of the bonus** is being finalised (see the box on the application process for the water bonus).

In light of the **partial accounting**, therefore, Acea Ato 2 **paid 8,034 national water bonuses for an economic value of approximately € 354,000 and 3,657 supplementary (local) water bonuses for an economic value of € 858,400**. The supplementary bonus was higher than the 2020 figures (746 supplementary water bonuses, with an economic value of € 135,298) **thanks to the possibility for those entitled to access, in addition to the ordinary valuation, and exclusively to cover past arrears, an additional one-off amount of up to three times the ordinary valuation**. This provision, **approved by the Conference of Mayors of ATO 2**, has been envisaged on an ex-

traordinary basis for the whole of 2021 - unless extended - **in view of the emergency situation resulting from the Covid-19 pandemic**. In the first few months of 2021, **Acea Ato 5 accepted 307 requests** for the national water bonus, which generated total savings for beneficiaries of around **€ 35,000**.

AdF continued to give visibility to the possibility of accessing the **national water bonus** and the **supplementary bonus** through the flora.it website and by notices posted at branches. In 2021, **AdF invoiced the social water bonus to 4,558 beneficiaries** for requests made in 2020 but with a 2021 benefits end date, for a value of around **480,000**. In addition, a total of **2,649 users** benefited from the **supplementary water bonus**, amounting to **€ 595,234**.

For GORI, the total number of those entitled to the water bonus in the year was **21,538 beneficiaries, with a saving of € 880,739**. In May 2021, **Gesesa** launched a communication campaign through banners, commercials, press releases and through social media channels to give visibility and information on the procedures for accessing the water bonus benefits.

For the water companies in the scope, therefore, cumulating the data of the supplementary water bonuses, where applied, and the partial data from the national water bonuses, where available, **the system has generated for the beneficiaries a total economic saving of approximately € 2.4 million**.

⁴⁵ Resolution 897/2017, integrated text of the implementing rules for the social water bonus – TIBSI and subsequent amendments and additions in 2019 (resolution 165/2019/R/com and resolution 1/2019 – DACU) to update the measure to the regulatory provisions contained in Law 26/2019 (urgent provisions on national income and pensions).

Table no. 15 – Customers (energy and water sectors) (2019-2021)

| | u. m. | 2019 | 2020 | 2021 |
|---|---------------------------------|------------------|------------------|------------------|
| ENERGY AND GAS SALES (Acea Energia and Umbria Energy) | | | | |
| standard market service | no. of withdrawal points | 774,823 | 738,989 | 700,496 |
| free market EE - mass market | no. of withdrawal points | 322,037 | 364,378 | 393,182 |
| free market EE - large customers | no. of withdrawal points | 76,902 | 72,195 | 94,698 |
| free market gas | no. of redelivery points | 192,107 | 212,234 | 228,148 |
| total | no. of supply contracts | 1,365,869 | 1,387,796 | 1,416,524 |
| ENERGY DISTRIBUTION (Areti) | | | | |
| domestic customers, low voltage | no. of withdrawal points | 1,326,078 | 1,330,557 | 1,338,868 |
| non-domestic customers, low voltage | no. of withdrawal points | 305,925 | 296,248 | 298,736 |
| customers at medium voltage | no. of withdrawal points | 2,907 | 3,116 | 2,851 |
| customers at high voltage | no. of withdrawal points | 7 | 7 | 6 |
| total | no. of withdrawal points | 1,634,917 | 1,629,928 | 1,640,461 |
| WATER SALE AND DISTRIBUTION (main water Companies of Acea Group) | | | | |
| Acea Ato 2 | no. of users | 692,893 | 705,685 | 705,607 |
| Acea Ato 5 | no. of users | 199,823 | 200,876 | 201,878 |
| GORI | no. of users | 528,437 | 531,987 | 533,662 |
| Gesesa | no. of users | 57,142 | 57,247 | 57,404 |
| AdF (*) | no. of users | 231,690 | 232,152 | 233,440 |
| Acque | no. of users | 326,105 | 327,412 | 329,973 |
| Publiacqua (**) | no. of users | 397,684 | 399,943 | 402,370 |
| Umbra Acque | no. of users | 233,460 | 234,185 | 234,850 |
| total | no. of users | 2,667,234 | 2,689,487 | 2,699,184 |
| Acea Ato 2 | population served | 3,704,931 | 3,705,295 | 3,705,995 |
| Acea Ato 5 | population served | 469,836 | 467,993 | 455,164 |
| GORI | population served | 1,456,462 | 1,398,678 | 1,395,841 |
| Gesesa | population served | 120,574 | 116,897 | 110,316 |
| AdF | population served | 386,132 | 382,724 | 380,463 |
| Acque (***) | population served | 737,455 | 734,898 | 734,898 |
| Publiacqua (****) | population served | 1,247,216 | 1,217,083 | 1,217,083 |
| Umbra Acque | population served | 501,186 | 494,272 | 493,460 |
| total | population served | 8,623,792 | 8,517,840 | 8,493,220 |

(*) The 2021 figures are estimates.

(**) Some 2020 figures on users and/or 'population served' have been adjusted, after the final calculation.

(***) Figures for 2021 are estimates; some 2020 figures on users and/or "population served" have been adjusted, after the final calculation.

(****) Some 2020 data on users and/or the 'population served' have been adjusted after the final calculation.

PERCEIVED QUALITY



Surveys of customer and public satisfaction with services delivered:

more than 35,283 people interviewed



Overall opinion in 2021

on the services provided (score 1-10):

Electricity service "sales" (MV and LV): **7.7**

and "distribution": **7.8**

public lighting service: **6.7**

water service in Rome, Fiumicino and province: **7.9** and

7.2 in Frosinone and province: **6.3**

in Sarnese Vesuviano: **6.6**

in Benevento and province: **6.9**

in Grosseto, Siena and province: **7.5**

The **Customer listening Unit** of the Parent Company **coordinates the process of measuring customer and citizen satisfaction** with the services provided in the electrical, water⁴⁶ and public lighting sectors. The Unit works **in agreement with the operating companies** that manage the services and **supports top management with analysis of the data collected**.

Customer satisfaction surveys ("perceived quality") are carried out **twice a year** by an institute specialising in demographic research, selected by tender.

In 2021, with a view to the constant improvement of measurements, a new continuous survey method has been designed, especially for the satisfaction surveys of customers who contacted Acea through the various channels available.

The 2021 half-yearly surveys, in line with previous years, were conducted using CATI methodology⁴⁷, but CAWI (online surveys) was also added to this survey method. Since the new method has not yet been applied uniformly to the various Group companies and introduces a discontinuity in the interpretation of results, **in order to maintain a comparison, presented here are only the data collected using the CATI method, which have enabled the following main indicators to be processed:**

- the overall **judgement** on the general quality of the service (**scale of 1 to 10**), where 1 means very bad and 10 means very good, which expresses an **instinctive evaluation** by customers;
- **overall opinions on individual aspects of the service** (scale of 1-10);
- the **percentages of satisfaction with the items**, or quality factors, selected within each aspect of the service, according to the importance attached to them by the respondents.

The synthetic CSI (Customer Satisfaction Index) indicators presented in previous editions of the *Sustainability Report* are therefore being **replaced by overall opinions** on services and their individual

aspects, as these are more stable indicators than the CSI⁴⁸. To **ensure comparability** with the previous year, **the results of the 2020 surveys were expressed using the same indicators as those used in 2021**.

Interviews on "**contact channels**" are aimed at selected **customers**, using the "call back" method, **from among those who have used the services** (toll-free numbers for commercial information or fault reporting, website, branch, technical intervention, chat channels and digital service points) **immediately before the first entry** and consented to be contacted again.

Concerning the **physical branch**, unlike what happened in some cases, in 2020 following the closures imposed by the health emergency for the first semester, **in 2021 it was possible to conduct the interviews in both the first and second semester**.

In the two customer satisfaction survey sessions carried out in 2021, a total of **35,283 people were interviewed** about the quality of the services provided by Acea Energia, Areti - both for the distribution and public lighting service -, Acea Ato 2 (Rome and Fiumicino and province), Acea Ato 5, GORI, Gesesa and AdF. The **overall opinions** expressed on each service, as an average of the two six-monthly surveys, fall **within the area of average satisfaction** and between 6.3 and 7.9 (see the charts below and the tables at the end of this paragraph).

The **overall opinions** expressed on the **electricity service and the main aspects** into which it is divided indicate, for **Acea Energia sales**, positive evaluations and above average satisfaction (rating > 7/10) both for the service in general (7.9/10 for standard market customers and 7.6/10 for free market customers) and for the aspects of "billing" and "online branch", the latter surveyed among free market customers, while the aspects of "toll-free number" and "branch"

⁴⁶ As regards water services, the main results of the customer satisfaction surveys carried out by Acea SpA and reported here concern the customers of the companies Acea Ato 2 (Rome and Fiumicino and province) and Acea Ato 5 (Frosinone and province) operating in the Lazio area, Gesesa and GORI, both operating in Campania, and AdF, operating in Tuscany.

⁴⁷ Computer Assisted Telephone Interviewing of a stratified sample based on variables and representative of the universe of reference, following a structured questionnaire. Depending on the sample, the statistical error varies between +/- 2.8% and a maximum of +/- 4.3% and the level of significance is 95%.

⁴⁸ In fact, the CSI is based on a statistical formula comprising the proportion of customers satisfied with the different aspects/channels and a predetermined system of weights relating to the importance of each factor; aspects and weights are currently being revised to better reflect the evolution of services and their importance over the historical period.

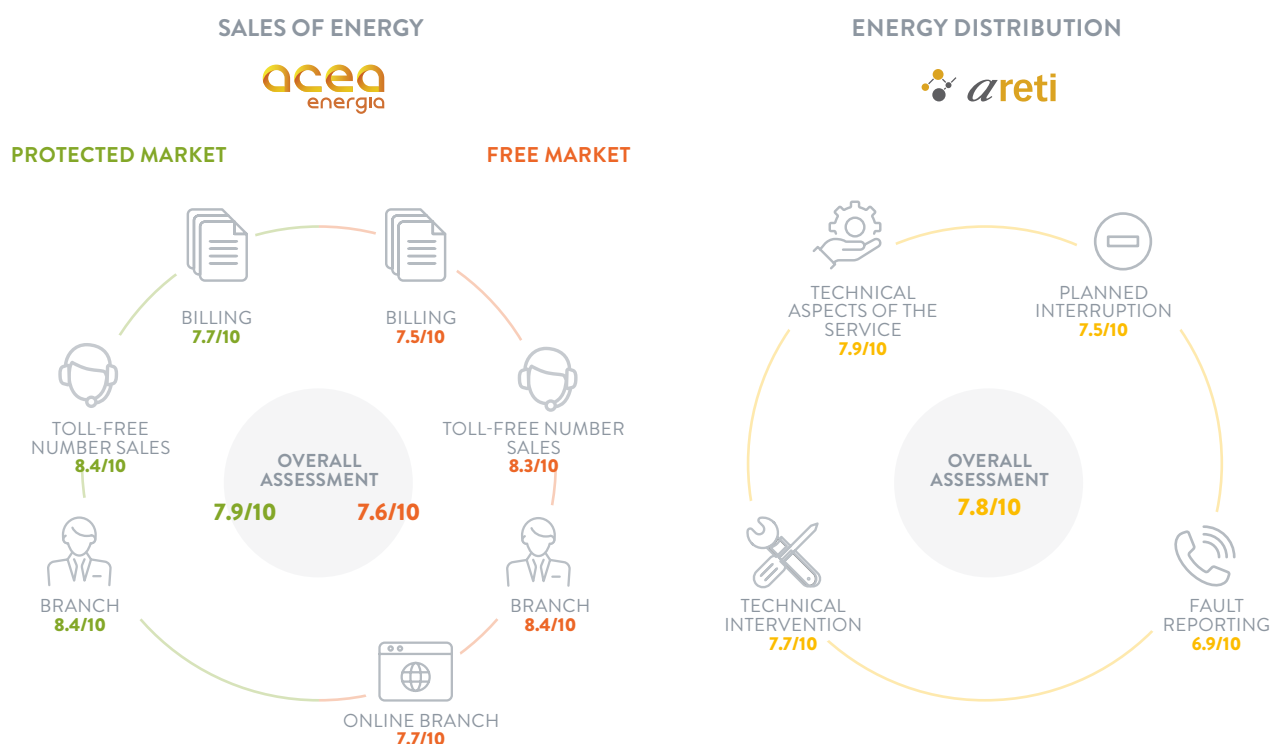
are in the area of complete satisfaction (ratings of 8-10) for both standard and free market customers. For **distribution**, managed by **Areti**, the overall rating is 7.8/10 and the aspects of the service, with the exception of "fault reporting" which, with 6.9/10, is in the average satisfaction range (ratings of 6-7), receive overall opinions above 7/10 and in particular the "technical aspects of the service" (7.9/10) and "technical intervention" (7.7/10) are close to the complete satisfaction area. Residents of Rome were interviewed about the **Public Lighting service** for all areas. The overall opinions on the service and its aspects are confirmed to be of average satisfaction (rating of 6-7), with 'fault reporting' receiving higher ratings of 7.5/10.

As regards the water service (sale and distribution of water), the satisfaction of **customers of Acea Ato 2** (Rome and Fiumicino and province) and **Acea Ato 5** (Frosinone and province), in the Lazio area, customers of **GORI** and **Gesesa**, operating in Campania, and customers of **AdF**, operating in Tuscany, was measured. The overall opinion on the service provided by **Acea Ato 2 in Rome and Fiumicino** is 7.9/10; the "billing" and "technical aspects" of the service receive overall ratings above the satisfaction average (> 7/10) and "fault reporting", "technical intervention", "sales toll-free number" and "branch" are in the area of complete satisfaction (ratings of 8-10). For **Acea Ato 5**, which operates in the city and province of Frosinone, the overall rating of the service is 6.3/10; the overall opinions on "billing" and "technical aspects" are on the average level of satis-

faction, while all other aspects receive overall ratings of over 7/10 and close to complete satisfaction. For **GORI**, which manages the service in the Sorrento peninsula and Vesuvian centres between the provinces of Naples and Salerno, the overall opinion is also 6.6/10; the "billing" aspect, with an overall opinion of 6.6/10, is in the area of average satisfaction, "fault reporting" (7.7/10) and "commercial toll-free number" (7.8/10) are close to complete satisfaction and the other aspects of the service have overall opinions of 8/10 or higher. With regard to **AdF** which operates in Tuscany, in the provinces of Grosseto and Siena, the overall opinion on the service is 7.5/10; the overall rating of the service aspects are over 7/10 for "billing" and "technical aspects" and over 8/10, i.e. in the area of complete satisfaction, for all other areas. Finally, for **Gesesa**, which operates in the city and province of Benevento, the overall opinion for the service is 6.9/10; the 'technical aspects of the service' receive an overall opinion of 7.2/10, higher than the average satisfaction rating, and billing 6.9/10.

The charts below show, for each service, the **2021 overall opinion (scale of 1-10)**, as the average of the two surveys for the year, and **Tables 16 and 17** also show the **percentages of satisfied customers** insofar as the most important **quality factors** for the electricity sales and distribution services, the public lighting service and the water service, and the **comparison with the previous year**, with indication of the most significant deviations.

Chart no. 22 – Overall opinion and on electricity service aspects – sale and distribution of energy - 2021 (scale of 1-10)



NB: the overall opinions and on the individual aspects of the service – shown in the chart are the average of the two semi-annual surveys.

Chart no. 23 – Overall opinion and on aspects of the public lighting service in Rome and Formello - 2021 (scale of 1-10)

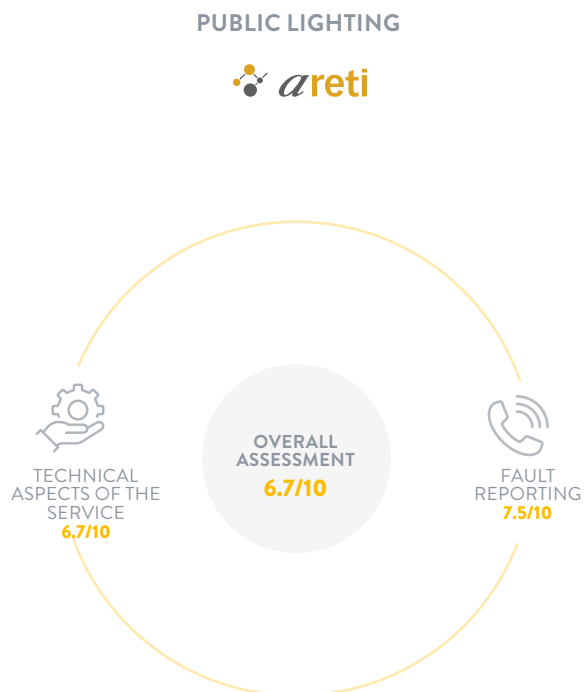
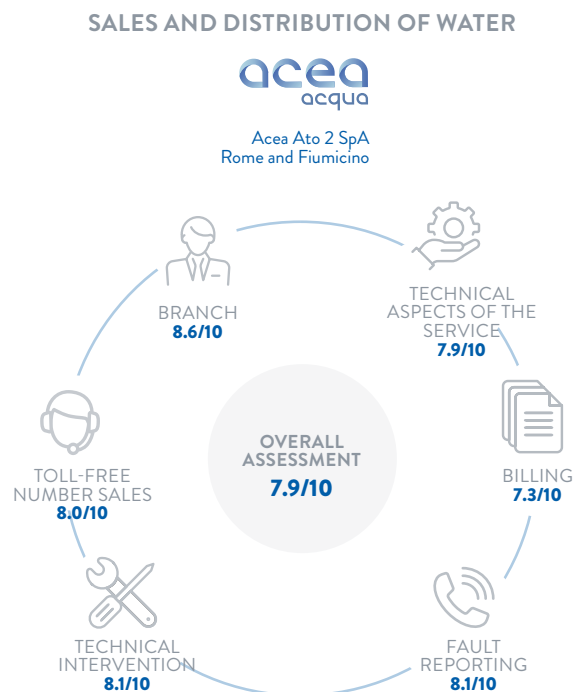


Chart no. 24 – Overall opinion and on aspects of the water service – sale and distribution of water in Rome and Fiumicino 2021 (scale of 1-10)



NB: the overall opinions and on the individual aspects of the service – shown in the chart are the average of the two semi-annual surveys.

SURVEYS ON SATISFACTION WITH WATER SERVICE IN OTHER AREAS IN ATO 2 – CENTRAL LAZIO

Customer satisfaction surveys were also conducted **in the province of Rome**. In particular, **in 2021**, the two six-monthly surveys involved a sample of **2,200 customers** with direct users, representative of three territorial areas – **North Lazio, East Lazio and South Lazio** – falling within Optimal Territorial Area 2 – Central Lazio, managed by Acea Ato 2. The surveys carried out in previous years, on the other hand, referred to four specific 'sentinel' municipalities; the results of the two-year surveys are therefore not directly comparable.

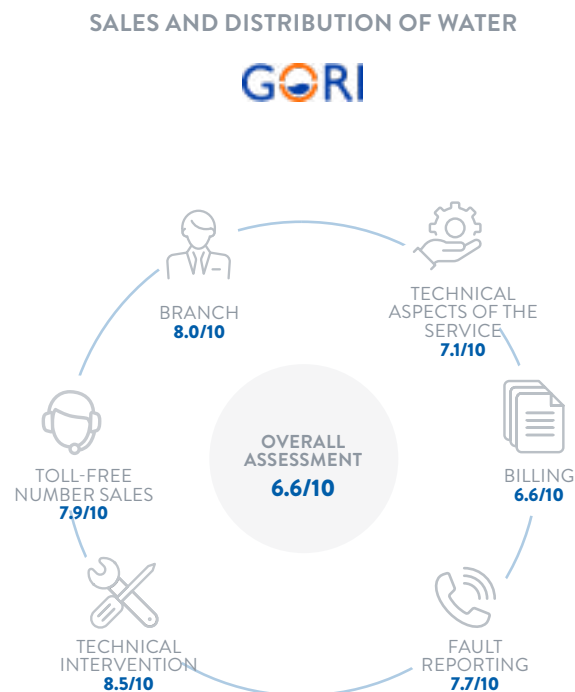
The **overall opinion on the water service** in 2021 was **7.2/10**; ratings for **individual aspects** of the service were **7.5/10** for "**technical aspects**" (including continuity of service and water pressure level), **7.3/10** for "**billing**", **6.8/10** for "**fault reporting**", **7.3/10** for "**technical intervention**", **7.3/10** for "**sales toll-free number**" and **6.5/10** for "**branch**". All the ratings expressed are therefore in the area of average satisfaction.



Chart no. 25 – Overall opinion and on aspects of the water service – sale and distribution of water in Frosinone and its province 2021 (scale of 1-10)



Chart no. 26 – Overall opinion and on aspects of the water service – sale and distribution of water in Sarnese Vesuviano 2021 (scale of 1-10)



NB: the overall opinions and on the individual aspects of the service – shown in the chart are the average of the two semi-annual surveys.

Chart no. 27 – Overall opinion and on aspects of the water service – sale and distribution of water in Territorial Conference No. 6 “Ombrore” - 2021 (scale of 1-10)

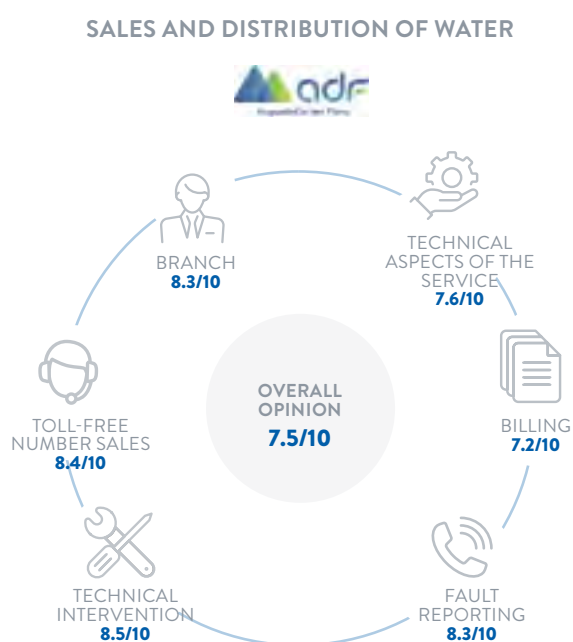
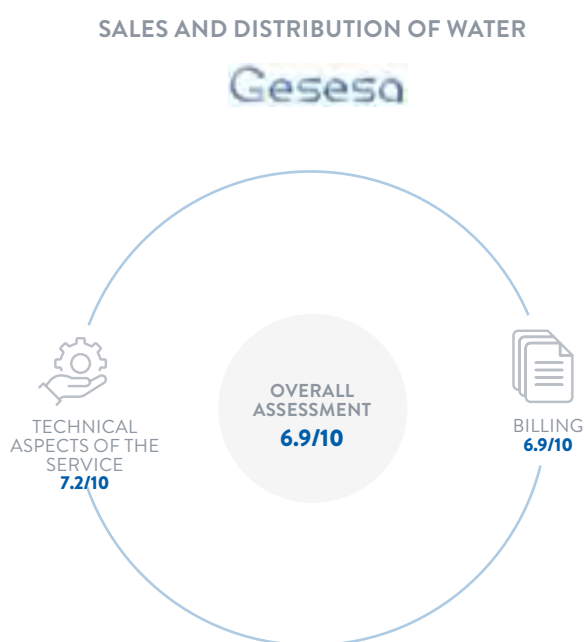


Chart no. 28 – Overall opinion and on aspects of the water service – sale and distribution of water in Benevento and its province 2021 (scale of 1-10)



NB: the overall opinions and on the individual aspects of the service – shown in the chart are the average of the two semi-annual surveys.

Table no. 16 – Results of customer satisfactions surveys: sales and distribution of energy, public lighting service (2020-2021)**average of the two interim reports**

| | u. m. | 2020 | 2021 |
|---|-------------|------------|------------|
| electrical service – sale of energy – ACEA ENERGIA | | | |
| STANDARD MARKET CUSTOMERS (*) | | | |
| sales activity (overall opinion) | 1-10 | 8.0 | 7.9 |
| ASPECTS OF THE SERVICE AND ELEMENTS OF QUALITY | | | |
| billing | 1-10 | 7.7 | 7.7 |
| correctness of the amounts | % | 90.4 | 91.9 |
| bill clear and easy to read | % | 89.1 | 90.1 |
| sales toll free number | 1-10 | 7.8 | 8.4 |
| operator's competence | % | 92.9 | 93.6 |
| operator's courtesy and availability | % | 94.9 | 94.3 |
| branch | 1-10 | 8.2 | 8.4 |
| operator's competence | % | 93.5 | 92.2 |
| clarity of the information provided | % | 93.1 | 91.9 |
| FREE MARKET CUSTOMERS (**) | | | |
| sales activity (overall opinion) | 1-10 | 7.9 | 7.6 |
| ASPECTS OF THE SERVICE AND ELEMENTS OF QUALITY | | | |
| billing | 1-10 | 7.7 | 7.5 |
| correctness of the amounts (***) | % | 88.7 | 86.8 |
| bill clear and easy to read | % | 89.8 | 88.6 |
| sales toll free number | 1-10 | 7.8 | 8.3 |
| operator's competence | % | 91.9 | 89.1 |
| clarity of answers provided | % | 92.0 | 88.5 |
| branch | 1-10 | 8.3 | 8.4 |
| operator's competence | % | 93.5 | 90.5 |
| clarity of the information provided | % | 93.6 | 90.4 |
| on-line branch | 1-10 | 7.6 | 7.7 |
| clarity of the information found | % | 89.0 | 94.9 |
| communicating meter reading | % | 89.7 | 91.7 |
| electrical service – energy distribution – ARETI (Rome and Formello) | | | |
| distribution activity (overall opinion) | 1-10 | 8.0 | 7.8 |
| ASPECTS OF THE SERVICE AND ELEMENTS OF QUALITY | | | |
| technical aspects of the service | 1-10 | 8.3 | 7.9 |
| service continuity | % | 95.2 | 97.5 |
| planned interruption | 1-10 | 7.7 | 7.5 |
| clarity of information on notices regarding recovery times | % | 87.7 | 86.8 |
| prior notice of suspended supply | % | 88.7 | 87.1 |
| fault reporting | 1-10 | 7.3 | 6.9 |
| clarity of the information provided | % | 86.7 | 78.3 |
| operator's courtesy and availability | % | 90.4 | 82.9 |
| technical intervention | 1-10 | 7.7 | 7.7 |
| intervention speed following the request | % | 80.7 | 80.3 |
| technicians' competence | % | 89.9 | 85.1 |
| public lighting service – ARETI (Rome and Formello) | | | |
| lighting service (overall opinion) | 1-10 | 6.5 | 6.7 |
| ASPECTS OF THE SERVICE AND ELEMENTS OF QUALITY | | | |
| technical aspects of the service (***) | 1-10 | 6.7 | 6.7 |
| service continuity | % | 73.5 | 77.2 |
| switching on and off times | % | 84.8 | 84.7 |
| fault reporting | 1-10 | 7.6 | 7.5 |
| operator's courtesy and availability | % | 91.8 | 90.8 |
| clarity of the information provided | % | 89.1 | 86.3 |

(*) It should be noted that, in the context of the interviews of standard market customers, the "website" aspect of the service was no longer investigated in 2021; instead, the "digital consultant" and "chat service" aspects were introduced, the results of which will possibly be illustrated in the next reporting cycle, to allow for a two-year comparison.

(**) Also for free market customers in 2021, the "website" aspect was no longer investigated and the "digital consultant" and "chat service" aspects were introduced, which will possibly be presented in the next reporting cycle. On the other hand, the results of the surveys on the "online branch" aspect are made public, for which the two-year comparison can be produced.

(***) The figure refers to the correctness of the amounts of the electricity supply on the bill.

(****) From 2021 onwards, only the technical aspects dependent on Acea were rated.

NOTE: the table shows only the quality factors indicated as most important by the sample of interviewees in 2021, which may lead to consequent changes in the 2020 column. The right-hand column also shows the most significant deviations, of about 5 percentage points, for the individual items surveyed.

Table no. 17 – Results of customer satisfactions surveys: water service (2020-2021)

average of the two interim reports

| | u. m. | 2020 | 2021 | |
|--|-------------|------------|------------|---|
| water service – sale and distribution of water – ACEA ATO 2 (Rome and Fiumicino) | | | | |
| water service (overall opinion) | 1-10 | 8.0 | 7.9 | |
| ASPECTS OF THE SERVICE AND ELEMENTS OF QUALITY | | | | |
| technical aspects of the service | 1-10 | 8.1 | 7.9 | |
| <i>service continuity</i> | % | 95.3 | 96.2 | |
| billing | 1-10 | 7.3 | 7.3 | |
| <i>correctness of the amounts</i> | % | 88.9 | 93.9 | ▲ |
| <i>bill clear and easy to read</i> | % | 87.4 | 92.3 | ▲ |
| fault reporting | 1-10 | 8.1 | 8.1 | |
| <i>clarity of the information provided</i> | % | 87.6 | 91.3 | |
| <i>operator's courtesy and availability</i> | % | 92.9 | 93.5 | |
| technical intervention | 1-10 | 8.1 | 8.1 | |
| <i>technicians' competence</i> | % | 91.5 | 90.6 | |
| <i>intervention speed following the request</i> | % | 84.8 | 85.5 | |
| sales toll free number | 1-10 | 7.9 | 8.0 | |
| <i>operator's competence</i> | % | 90.5 | 89.3 | |
| <i>operator's courtesy and availability</i> | % | 93.5 | 90.9 | |
| branch | 1-10 | 8.2 | 8.6 | |
| <i>operator's competence</i> | % | 91.7 | 93.5 | |
| <i>clarity of the information provided</i> | % | 91.1 | 93.6 | |
| water service – sale and distribution of water – ACEA ATO 5 (municipalities within ATO 5 – Frosinone) | | | | |
| water service (overall opinion) | 1-10 | 6.1 | 6.3 | |
| ASPECTS OF THE SERVICE AND ELEMENTS OF QUALITY | | | | |
| technical aspects of the service | 1-10 | 6.7 | 6.9 | |
| <i>service continuity</i> | % | 77.0 | 81.6 | |
| billing | 1-10 | 6.3 | 6.5 | |
| <i>correctness of the amounts</i> | % | 77.0 | 75.7 | |
| <i>bill clear and easy to read</i> | % | 77.3 | 77.5 | |
| fault reporting | 1-10 | 7.9 | 7.9 | |
| <i>clarity of the information provided</i> | % | 93.3 | 90.8 | |
| <i>operator's courtesy and availability</i> | % | 94.6 | 89.3 | |
| technical intervention | 1-10 | 7.7 | 7.8 | |
| <i>technicians' competence</i> | % | 89.3 | 88.0 | |
| <i>intervention speed following the request</i> | % | 79.9 | 81.8 | |
| sales toll free number | 1-10 | 7.9 | 7.8 | |
| <i>operator's competence</i> | % | 90.6 | 93.5 | |
| <i>clarity of the information provided</i> | % | 89.4 | 93.3 | |
| branch (*) | 1-10 | 8.0 | 7.9 | |
| <i>operator's competence</i> | % | 92.6 | 97.6 | ▲ |
| <i>clarity of the information provided</i> | % | 92.8 | 97.8 | ▲ |
| water service – sale and distribution of water – GORI (municipalities within the Sarnese-Vesuviano District Area) | | | | |
| water service (overall opinion) | 1-10 | 6.6 | 6.6 | |
| ASPECTS OF THE SERVICE AND ELEMENTS OF QUALITY | | | | |
| technical aspects of the service | 1-10 | 6.9 | 7.1 | |
| <i>service continuity</i> | % | 81.2 | 79.8 | |
| billing | 1-10 | 6.6 | 6.6 | |
| <i>correctness of the amounts</i> | % | 76.9 | 72.6 | |
| <i>bill clear and easy to read</i> | % | 77.2 | 78.5 | |
| fault reporting | 1-10 | 7.5 | 7.7 | |
| <i>clarity of the information provided</i> | % | 88.6 | 86.9 | |
| <i>operator's courtesy and availability</i> | % | 90.8 | 89.1 | |
| technical intervention | 1-10 | 8.2 | 8.5 | |
| <i>technicians' courtesy and availability</i> | % | 96.4 | 91.8 | |
| <i>intervention speed following the request</i> | % | 92.5 | 90.5 | |

| | | | | |
|--|-------------|------------|------------|---|
| sales toll free number | 1-10 | 7.6 | 7.9 | |
| operator's competence | % | 87.8 | 88.9 | |
| clarity of the information provided | % | 89.8 | 89.4 | |
| branch | 1-10 | 7.8 | 8.0 | |
| operator's courtesy and availability | % | 92.6 | 89.4 | |
| clarity of the information provided | % | 90.9 | 88.9 | |
| water service – sale and distribution of water – ADF (municipalities falling within Territorial Optimal Conference no. 6 Ombrone) | | | | |
| water service (overall opinion) | 1-10 | 7.6 | 7.5 | |
| ASPECTS OF THE SERVICE AND ELEMENTS OF QUALITY | | | | |
| technical aspects of the service | 1-10 | 7.8 | 7.6 | |
| service continuity | % | 92.0 | 92.3 | |
| billing | 1-10 | 7.3 | 7.2 | |
| correctness of the amounts | % | 85.7 | 87.6 | |
| bill clear and easy to read | % | 86.4 | 87.2 | |
| fault reporting | 1-10 | 8.2 | 8.3 | |
| clarity of the information provided | % | 90.8 | 90.8 | |
| operator's courtesy and availability | % | 96.0 | 93.8 | |
| technical intervention | 1-10 | 8.3 | 8.5 | |
| problem-solving skills | % | 93.3 | 95.3 | |
| technicians' courtesy and availability | % | 95.0 | 96.5 | |
| sales toll free number | 1-10 | 7.9 | 8.4 | |
| operator's competence | % | 88.5 | 94.6 | ▲ |
| clarity of the information provided | % | 87.8 | 94.3 | ▲ |
| branch (**) | 1-10 | - | 8.3 | |
| clarity of the information provided | % | - | 90.3 | |
| operator's competence | % | - | 89.8 | |
| water service – sale and distribution of water – GESESA (***) (municipalities within ATO – Calore Irpino) | | | | |
| water service (overall opinion) | 1-10 | 6.6 | 6.9 | |
| ASPECTS OF THE SERVICE AND ELEMENTS OF QUALITY | | | | |
| technical aspects of the service | 1-10 | 7.0 | 7.2 | |
| service continuity | % | 83.6 | 84.2 | |
| billing | 1-10 | 6.7 | 6.9 | |
| correctness of the amounts | % | 77.8 | 80.1 | |
| bill clear and easy to read | % | 77.2 | 81.9 | |

(*) It should be noted that in the satisfaction surveys of Acea Ato 5 customers relating to the "branch" aspect, the data for the first half of the year, included in the calculation of the average for the year, refers to a sample of only 52 respondents, which is lower than the statistical significance, due to the low influx recorded for the pandemic situation.

(**) For AdF, the 'branch' aspect was not investigated in 2020, due to the prolonged closure caused by the health emergency.

(***) For Gesesa, a smaller company, the service aspects investigated are "technical aspects" and "billing". It should be noted that in 2020 the surveys took place only in the second half of the year, while the 2021 data are the average of the two surveys of the year. The decision to illustrate the results of the customer satisfaction surveys of all the companies by means of overall opinions has made it possible to include Gesesa in the table for the first time.

NOTE: the table shows **only the quality factors indicated as most important by the sample of interviewees in 2021**, which may lead to consequent changes in the 2020 column. The right-hand column also shows the **most significant deviations, of about 5 percentage points**, for the individual items surveyed.

QUALITY DELIVERED

Acea oversees the **quality of the services provided** with interventions aimed at its constant improvement. To this end it trains people and ensure that they attend seminars, applies innovative technology to the management of processes, renews and expands the infrastructure (networks and plants), increasing its resilience, also aimed at the reduction of failures and timely recovery, increases the offer of digital contact channels, complementing the traditional ones and takes care of communication with customers.

The **"quality delivered"** is also measured via **benchmarks defined by the sector authority** or indicated in the **service contracts and management agreements** with local authorities, in particular:

- for the **Public Lighting** service, the contract between Acea and Roma Capitale regulates the qualitative parameters (performance standards);

- the **technical and commercial quality standards in the energy sector** (for both distribution and sales) **and the contractual and technical quality standards in the integrated water service are defined and updated** by the **Energy, Networks and Environment Authority (ARERA)** and, for the water sector, also by the local authorities.

The **main regulatory interventions by ARERA** in 2021 for the electricity and water sectors are summarised in the *Group profile*, in the paragraph *"Context analysis and business model"*, to which reference should be made.

In addition to complying with the quality standards laid down by the regulation, Group companies operate in accordance with **UNI EN ISO certified management systems** based on a **rationale of continuous improvement** (see also *Corporate identity*, in the paragraph *Management systems*).

QUALITY IN THE ENERGY SEGMENT

This section illustrates the quality aspects relating to **electricity distribution services** in the municipalities of Rome and Formello, and **public lighting** in the municipality of Rome, both managed by Areti⁴⁹, while for electricity and gas sales, managed by Acea

Energia, see the section on Customer Care.

The Company operates in compliance with the **QESE (Quality, Environment, Safety and Energy) Management System** for both the construction and management of distribution infrastructure and Public Lighting.

THE DISTRIBUTION OF ELECTRICITY



Plan for en masse replacement of second generation devices: **installed** in 2021, an additional **316,176 2G meters**



as part of **Areti's resilience plan** for **critical factor "heat waves"**: **122 km** of MV cable were upgraded and **98 secondary substation** renovations were carried out **critical factor "flooding"**: **36 secondary cabins** built



in 2021: **7,582 MV nodes** remotely controlled

Areti plans and carries out the modernisation and expansion works on **the electricity distribution network**, consisting of high (HV), medium (MV) and low (LV) voltage power lines, primary and secondary substations, and systems for the remote control and measurement of energy drawn from and fed into the grid. The **interventions** take into account the objectives established by the national authority (ARERA), the progressive evolution of electricity applications, the increase in "prosumers"⁵⁰, new connections, etc., and **aim to make the infrastructures increasingly resilient**, with an adequate and **enabling network configuration for future scenarios, such as widespread electric mobility and progressive electrification of consumptions**.

The **integrated development of the electricity grids** is defined in the **Master Plans** for the HV, MV and LV networks, which Areti implements through construction - and also decommissioning or demolition, and consequent containment of environmental impacts, in specific areas-, transformation, modernisation, maintenance, etc.

(see Table 18). The interventions carried out each year are aimed at **rationalising and upgrading the networks**, increasing transport capacity and margins for further use, **increasing their adaptability** and **reducing network losses and voltage drops**, improving **service continuity**.

In 2021, as part of the implementation of the **Resilience Plan**⁵¹, **122 km of medium voltage cable** at 20 kV were upgraded and **98 secondary substation renovations were carried out to increase their resilience to the critical factor of "heat waves"**, and **36 secondary substation renovations were carried out to increase resilience to the critical factor "flooding"**. For the LV networks, **118 km** were put in place as part of the **overall network modernisation programme**, in preparation for the subsequent voltage change from 230 V to 400 V. Remote control was extended to additional **secondary substations** and reclosers, for a **total of 7,582 remote-controlled MV nodes at 31/12/2021**.

49 Areti holds the ministerial concession for the distribution of electricity in the areas indicated and manages public lighting under the *Service Contract* stipulated between Acea SpA and Roma Capitale.

50 Prosumers are both consumers and producers of energy, which they use for their own consumption or sell to the grid (see the box on prosumers connected to Acea's networks, which are constantly increasing, in the section on *Acea Group customers: electricity and water services*).

51 Areti's Resilience Plan was submitted to ARERA in June 2019.

Table no. 18 – Main interventions for the management and development of electricity grids and substations (2021)

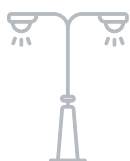
| type of work | HV lines and primary substations (PSs) |
|---|---|
| Demolition of grid and supports | work continued on the dismantling of high-voltage lines , which had been taken out of service, leading to the removal of a total of 48 pylons of the 150 kV and 60 kV lines; a total of 7.2 km of 150 kV high-voltage lines in fluid oil underground cable (Belsito-Tor di Quinto and Belsito-Monte Mario/F sections) were decommissioned. |
| Construction of grid and supports | construction began on the new section of the 150 kV Selvotta - Castel Romano overhead line (5.8 km long and comprising 24 supports); construction continued on the new section of the 150 kV North Rome - San Basilio underground cable line (3.4 km long); new 150 kV XLPE (cross-linked polyethylene) underground cables were put into service to replace the above-mentioned cables that had been decommissioned (7.2 km of the Belsito - Tor Di Quinto and Belsito - M. Mario/F sections). |
| Station upgrading, expansion, renovation | interventions were carried out in 51 primary substations; at the PS. Belsito was put into service the new HV 150kV hybrid switchgear |
| Ordinary and extraordinary maintenance on PS station equipment | interventions were made on 106 high-voltage circuit breakers and 784 medium-voltage circuit breakers were maintained; 16 on-load tap changers of power transformers were overhauled and 63 high-voltage measuring transformers were replaced; power transformers at the Appio primary substation and the ATR transformer at the Flaminia Receiver were also replaced. |
| | HV and MV protection and measures |
| Remote management | the following were prepared, calibrated and put into operation 78 new MV line bays ; checked 327 posts (57 HV posts and 421 MV posts) and 43 transformers (between HV/MV and MV/MV). |
| measures | earth resistance measurements were carried out on 2,350 secondary substations ; step and contact voltages and total earth resistance measurements were conducted on 12 substations (5 primary and 7 secondary). |
| | MV and LV lines |
| Modernisation and upgrading of MV networks (transformation from 8.4 kV to 20 kV) and LV networks (transformation from 230 V to 400 V) | 196 km of 20 kV MV cable (22 km for expansion and 174 km for upgrading), including 122 km to increase resilience to heat waves , and 192 km of LV cable (74 km for expansion and 118 km for upgrading in preparation for voltage changeover) were installed. |
| ordinary and extraordinary maintenance | heloborne inspections were carried out for an extension of the overhead MV network equal to 170 km , in order to carry out specific interventions to replace equipment, supports, conductors, etc. necessary for the preservation and maintenance of the functionality of the systems. |
| | secondary substations (SSs) and remote control |
| construction, extension, reconstruction SS | 835 secondary substations were built/upgraded/rebuilt (190 for new connections or power increases, 645 for upgrading to 20 kV, renewing equipment, setting up remote control), of which 134 substations were rebuilt to increase resilience to "heat waves" (98 substations) and "flooding" (36 substations). |
| ordinary and extraordinary maintenance on SS | 1,019 extraordinary maintenance operations and 2,067 inspections on secondary substations were carried out |
| remote control | remote control was extended to 335 secondary substations and 394 reclosers (7,582 MT nodes were remote controlled at 31/12/2021) and 4,664 maintenance operations were carried on TLCs and reclosers. |

In 2021, Areti carried out interventions to protect the primary and secondary substations, as part of the activities aimed at raising the levels of security for the **protection of infrastructures from cyber risks, integrated technological solutions** have been implemented to protect field equipment and **detect any vulnerability of industrial network protocols**. In addition, Quick **SIEM** and **Blue Team** services were strengthened to monitor the network infrastructure and manage incidents, ensuring security oversight in view of the establishment of the **Security Operation Center (SOC)**. **Analyses** were started to identify additional technological solutions for upgrading the existing technological security system. See also the chapter Institutions and Business for an in-depth analysis of research and innovation and the projects implemented in the year.

Following the launch, in the last quarter of 2020, of the plan to **massively replace first-generation (1G) meters with second-generation (2G) ones, which will progressively affect the entire managed territory, in 2021 Areti installed a further 316,176 2G meters**; the new meters encourage greater **customer awareness of consumption**, thanks to the data available, and a **reduction in estimated billing**.

The total number of **remote-controlled meters** (1G and 2G) installed on low-voltage active users at 31/12/2021 is **1,646,739**.

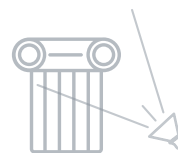
PUBLIC LIGHTING



201,215 light points
and **227,635** bulbs
managed in Rome:
92% of the park LED
lamps



1,697 lamp posts
reinstalled and
7,952 maintenance
interventions on LED
lamps/fixtures



artistic lighting:
installations renewed for en-
hancement of Palatino, Porta
S. Sebastiano and Fontana dello
Zodiaco in Ostia

Areti manages, by virtue of the Service Agreement⁵² between Acea SpA and Roma Capitale, works on the **functional and artistic-monumental public lighting infrastructures**, for about **201,200 light-ing points** located on a territory covering about 1,300 km².

The company handles the **design, construction, operation, main-tenance and renovation of lighting networks and installations**, and plans interventions **in accordance with the instructions of the local**

government departments and supervisory departments, which are responsible for new urban developments, redevelopment projects and cultural heritage.

In addition to the service provided to Roma Capitale, Areti also makes public and artistic lighting services available to other stake-holders (e.g. ecclesiastical bodies, hotels, etc.).

Table no. 19 – Public lighting in Rome in figures (2021)

| | |
|---|-----------------|
| lighting points (no.) | 201,215 approx. |
| monumental artistic lighting points (no.) | 10,128 |
| bulbs (no.) | 227,635 |
| MV and LV network (km) | 8,036 |

Energy consumption for public lighting, which has been on a down-ward trend in recent years thanks to the gradual modernisation of the systems with the installation of LED technology lamps, will sta-bilise in 2021; as at 31/12/2021, the **208,870 LED lamps installed cover around 92% of the total number of lamps** (see *Relations with the environment; The use of materials, energy and water and the Envi-ronmental Accounts*).

In 2021, the **tender procedure** to find a partner for the implemen-tation of the **"POLEDRIC" project was concluded**. It was launched the previous year, with the aim of developing an **innovative techno-logical solution** for the creation of a **"smart pole"**, in a **"smart city"** perspective (see the chapter *Institutions and the Company, Commit-ment to Research and Innovation*).

The lighting projects carried out during the year include, by way of example, the **new lighting of some parks and gardens** located in central and suburban areas of the capital, for the benefit and greater safety of citizens, including **the park at Tor Sapienza, the Commen-done park and the Villa Massimo park**, and among the functional projects the installations in **Via della Mortella** and **Via del Carbonio**. (see boxes with more details).

⁵² By Resolution of the City Council No. 130 dated 22 December 2010 regarding the *Updating of the Service Agreement between Roma Capitale and Acea SpA*, effective 15 March 2011, the agreement was extended to 31/12/2027.

LIGHTING WORKS IN PARKS AND GARDENS

The new lighting in **Tor Sapienza Park** has been financed with funds from the Quality of Light Plan 2021. The work involved the laying of more than **1.3 km of cable** and **the installation of 57 lighting points**, with a total installed power of 2,380 W.

In **Piazza Brin** the objective was to **standardise and brighten the lighting of the route** between Via Cialdi and Via Orlando, by **revising the lighting of the square, the stairway and the pedestrian underpass**; the existing lighting was integrated by installing **26 lighting points**, for a total of 750W installed and 330W removed, which contributed significantly to urban decorum.

In the green area of **Villa Massimo (Giuseppe de Meo garden)**, the **existing system was upgraded and implemented** by installing **21 candela** in the "Villa Umberto" style with "Trastevere" armature. The installed power is 790W and the removed power is 900W.

Finally, in **Piazza Re di Roma**, the existing system was extended by installing **10 lighting points** with an installed power of 350W. The intervention contributed to the **improvement of the lighting in the centre of the square**, thanks to the relocation of some lighting points and to increased illumination of both the external pavements and the internal paths, achieved through the installation of new supports.

TRANQUILLO CREMONA AND ANAGNINA TUSCOLANA FUNCTIONAL INTERVENTIONS

The intervention in **Via Tranquillo Cremona**, in the Tor Sapienza area, concerned the realisation of a public lighting system inside an area belonging to ATER, where the existing system was modernised and integrated; **45 functional LED lighting points** were installed along the road and **12 LED garden lighting points** in the green area, for a total installed power of 2,800W, and about 1,000 m of cable were laid.

In the **Anagnina Tuscolana** area, the junction carriageway from the G.R.A. was illuminated; two 30 m high mobile crown light towers were installed at a distance of about 100 m from each other, each equipped with **12 LED projectors** with asymmetrical street optics. The projectors have a power of 210W each, for a total of 5,024W installed.

Areti has **consolidated expertise in artistic and monumental lighting**, and in 2021 the main activities carried out in this area concerned the renovation of existing systems at sites of particular importance, including the **Palatine Hill**, the **Aurelian Walls** (in the Colombo-Numidia section), **Porta S. Sebastiano** and the **Zodiac Fountain in Ostia**, helping to enhance their beauty for the benefit of citizens and visitors (see the dedicated box below).

Every year, Areti carries out **efficiency and safety upgrades** at lighting points, as well as **scheduled and extraordinary maintenance** on the installations (see Table 20).



Table no. 20 – Main efficiency, safety, repair and maintenance projects (2021)

| type of work | (no.) |
|---|--|
| energy efficiency/technological innovation (replacement of fixtures) | 189 lighting points replaced (not including new LED installations) |
| safety measures | 1,817 lighting points made safe |
| checking corrosion on lamp posts | 31,425 supports verified (functional and artistic) |
| LED lamp reinforcement/maintenance | 7,952 maintenance jobs |
| Reinstalling lamp posts that were corroded or knocked down due to accidents | 1,697 lamp posts reinstalled |

NOTE: the table includes operations carried out for the Municipality of Rome and third parties.

Acea monitors the **quality parameters of the public lighting service** with regard to the **repair time of faults**, calculated from the time the report is received⁵³. The **performance standards** are **expressed by an average allowable restoration time (TMRA)**, within which repairs should be carried out, **and a maximum time (TMAX)**, beyond which **a penalty system is triggered**⁵⁴.

For the **2021 performance** relating to the **average recovery time**

(TMR) **of the functionality of the systems**, for the various types of failure, the best estimate available is shown in table 21, since the data, at the time of publication of this document, is in the process of being consolidated; most of the performances, with the exception of the single lighting point, are below the average permitted recovery time set out in the contract standards.

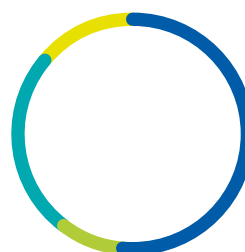
Table no. 21 – Public lighting recovery: Acea penalties, standards and performance (2020-2021)

| type of fault | daily penalty for delays | standard contractual service (*) | | Acea service | |
|---|--------------------------|---|---|--|-----------|
| | (€) | TMRA (average permitted recovery time) (working days) | TMAX (maximum recovery time) (working days) | TMR (average recovery time) (working days) | |
| | | | | 2020 | 2021 |
| blacked out neighbourhood – MV grid failure | 70 | 1 day | 1 day | <1 day | <1 day |
| blacked out street – MV or LV grid failure | 50 | 5 days | 8 days | 1.9 days | 1.2 days |
| blacked out stretch (2-4 consecutive lights out) | 50 | 10 days | 15 days | 8.4 days | 9.7 days |
| Lighting points out: single lamps, posts, supports and armour | 25 | 15 days | 20 days | 8.9 days | 23.4 days |

(*) Consistent with previous years, data were monitored in compliance with provisions under Annex D/2 to the 2005-2015 Municipality of Rome – Acea SpA Service Agreement.

Control systems, such as remote management, detect the fault situation, which **can also be reported** via contact channels (call centre, app, web, fax or letter)⁵⁵. **In 2021, 18,340 fault reports were received**⁵⁶, a reduction of around 5% compared to the previous year (19,278 reports), and **91%** were followed up within the year.

The **percentage distribution of the total number of reports received by type of fault** is shown in Chart 29. The most significant incidents confirm “blacked out street”, in relation to a “network fault” (52%) and “lighting point out” (26%), with the lowest impact in terms of safety. “Blacked out stretch” is more contained (9%) and decreasing. During the year there have been no cases of “Blacked out neighbourhood” due to grid failure.

Chart no. 29 – Types of public lighting faults out of total reports received (2021)

0% Blacked out neighbourhood – grid failure
 52% Blacked out street – grid failure
 9% Blacked out section (2-4 lamps switched off in a row)
 26% switched off lighting point (Single lamp, post, supports and armour)
 14% Other (door, cabinet, etc.)

53 For the purpose of calculating service levels, reports pertaining to damages caused by third parties are not be considered.

54 The calculation of penalties is based on the following criteria: any repair carried out beyond TMAX is penalised; those carried out with times below TMAX but above TMRA are only penalised if TMR>TMRA. At the time of publication of this document the data is not yet definitive, therefore the accurate data on 2020 reports subject to fines being calculated is not available.

55 More detailed information on call centre performance and written complaints is provided in the *Customer Care* section.

56 The data excludes reminders and repeated reporting of the same fault.

As mentioned, **Acea enhances the monumental heritage of the capital** in agreement with the relevant authorities, with over **10,100 light fixtures** for **artistic lighting**. The main **interventions of the**

year, already mentioned at the beginning of the paragraph, are illustrated in a separate box.



AMONG THE ARTISTIC LIGHTING PROJECTS: THE PALATINE, THE ZODIAC FOUNTAIN, A NEW SECTION OF THE AURELIAN WALL AND PORTA S. SEBASTIANO

A particularly important intervention, carried out in 2021, concerned the **Palatine Hill**, where Areti carried out an extraordinary maintenance operation, **replacing all the floodlights dedicated to the artistic lighting of the monumental complex with state-of-the-art fixtures**, equipped with an innovative integrated system of protection against power surges (SPD devices). Low-impact elements were used, custom-designed and engineered for the project, which involved the **replacement of 100 old-generation lighting points** and the **reinstallation of 105 state-of-the-art fixtures** to ensure greater weather resistance and a 15% reduction in electricity consumption. For the intervention at the **Zodiac Fountain in Ostia**, and in **Piazzale Cristoforo Colombo**, **53 20W LED underwater projectors** and **18 64W LED projectors** were installed; Areti was responsible for the design and implementation of the artistic lighting of the fountain and the functional lighting of the square. For the lighting of the pe-

destrian zone, a modular support was designed and built, the design of which was agreed with the Superintendency to minimise its aesthetic impact. Acea sponsored the artistic lighting of the fountain. As part of the Quality of Light project, the **artistic lighting of the Colombo-Numidia section of the Aurelian Walls** was carried out, as a continuation of the project carried out in 2020 at the linear park of the Walls. This involved the modernisation of a discharge system and an increase in the number of existing lighting points: from 53 lighting points to **142 state-of-the-art floodlights** with precision optics, with a total installed power of 9,720W. A second project was carried out at **Porta S. Sebastiano**, again modernising and increasing the number of lighting points by replacing 6 discharge floodlights with **36 state-of-the-art floodlights** (installed power from 900W to 2,575W). The project was drawn up in collaboration with the University of Roma Tre.

THE QUALITY LEVELS REGULATED BY ARERA IN THE ELECTRICITY SECTOR

The **Regulatory Authority for Energy, Networks and the Environment** (ARERA) defines, at a national level, the **commercial quality** standards (timing of the technical-commercial services requested by customers, such as estimates, work on connections, activation/deactivation of the supply, response to complaints) and **technical quality standards** (continuity of supply) **of the electricity service; it periodically reviews them**, directing operators to constantly improve performance.

Commercial quality is divided into **"specific"** and **"general"** levels,⁵⁷ for the **distributor** (differentiated for low and medium voltage supplies) and for those of the **seller** (see Tables 22, 23 and 24).

Every year **Acea communicates to ARERA the results achieved and includes them in the bill it sends to its customers**.

The 2021 commercial and technical quality results⁵⁸ related to the **distribution** and metering, as disclosed herein, represent the **best estimate available**⁵⁹ at the time of writing and may not coincide with those submitted to ARERA as part of the annual reports.

With regard to the **"specific" levels of commercial quality**, compared with last year, there has been an improvement in the timing of the execution of simple and complex works for the construction of new ordinary connections in LV (especially for domestic users) and MV, as well as a slight deterioration in other performances, although in most cases they fall within the standards set by the regulations in force.

With regard to the **"general" levels**, relating to responses to written complaints/enquiries, there was a deterioration in performance compared to 2020, attributable to the work of recovering backlogs, linked to the effects that the pandemic period has had on op-

erations (e.g. the increase in complaints due to the suspension of measurement data collection by the operator) (see table 22).

Automatic compensation to customers⁶⁰ to be paid in case of non-compliance with "specific" quality levels, start from a basic amount⁶¹, which can be doubled (if the timing of the activities exceeds the standard between two and three times) or tripled (if the timing exceeds the standard by three times).

For the quality aspects of the **sales** service, managed by **Acea Energia**, the **increase in the percentages of compliance with the standards** set by ARERA, already recorded in the last two years (see table 23), was confirmed in 2021.

With **reference** to Areti's performance related to the incentive regulation of the duration and **number of interruptions without prior notice for low-voltage users**, the data related to the 2021 financial year - summarised in Table no. 24 - indicate that in the urban areas characterised by the highest degree of concentration of users (so-called high and medium concentration territorial areas), the continuity of the service was guaranteed with a noticeably better quality compared to last year. Steady and already positive results are also being achieved in suburban and rural areas.

In addition to the indicators described above, the electricity distributor is also required to comply with specific levels of service continuity with reference to **medium voltage users** for which automatic compensation will be paid⁶² in cases where the number of interruptions during the year exceeds a defined standard.

Finally, separately for **medium and low voltage users** in the event of failure to comply with the maximum power restoration times, there is an additional reimbursement to be paid by the distribution company to each user that is disconnected for more than 4 or 8 hours respectively.

57 "Specific quality standards" are defined as the deadline within which the service provider must provide a given service and, in the event of non-compliance, they require that automatic compensation is granted to customers; the general quality standards" are defined as the minimum percentage of services to be provided within a given deadline.

58 Integrated Test on the output-based regulation of electricity distribution and measurement services – Annex A to ARERA resolution 646/2015/R/eel as subsequently amended and supplemented.

59 This is due to the misalignment between the delivery times of reports to the Authority and those required by law for the publication of this document.

60 Where due, automatic compensation is paid to the customer by deduction from the amount charged in the first subsequent bill and if needed in following bills, or paid by direct remittance. In any case, such automatic compensation must always be paid to the customer within 6 months from the date of receipt of the written complaint or the request for reimbursement of double billing, with the exception of customers who are billed quarterly, for which the term is set at 8 months. For distribution activities, automatic compensation is paid by the distributor to the service recipient within 7 months from the date on which the required service is provided.

61 The amount set by the Authority for compensation for non-compliance with the specific quality standards for the distribution service starts from a basic amount of € 35 for domestic low voltage customers; € 70 for non-domestic low voltage customers and € 140 for medium voltage customers. In the event of non-compliance with the specific quality standards of the sale, the seller shall pay the final customer an automatic compensation of € 25. Compensation grows in relation to the delay in the provision of the service.

62 In order to be entitled to compensation, medium voltage customers must prove that they have installed protection devices at their plants that can prevent any interruption caused by faults in their utility plants from having repercussions on the Areti network, damaging other customers connected nearby. Furthermore, they must send their own plant adequacy statement, issued by parties with specific technical and professional expertise. Where customers fail to meet the requirements whereby compensation may be sought, that amount is paid by Areti as a fine to the Energy and Environmental Services Fund.

Table no. 22 – The main specific and general levels of commercial quality – energy-distribution (2020-2021)
(ARERA parameters and Areti's performance - 2020: data reported to ARERA; 2021: estimated data)

ENERGY DISTRIBUTION

| SPECIFIC LEVELS OF COMMERCIAL QUALITY | | | | | |
|---|---|--|---|--|---|
| SERVICES | ARERA PARAMETERS – maximum time by which the service must be performed | average actual completion time for services | percentage of services carried out within time limit | average actual completion time for services | percentage of services car- ried out within time limit |
| | | | 2020 | 2021 | |
| LOW VOLTAGE (LV) SUPPLIES | | | | | |
| DOMESTIC CUSTOMERS | | ARETI'S PERFORMANCE | | | |
| estimates for work on LV networks (ordinary connections) | 15 working days | 8.09 | 95.38% | 9.08 | 91.05% |
| completion of simple work (ordinary connections) | 10 working days | 10.51 | 73.40% | 10.02 | 72.00% |
| completion of complex works | 50 working days | 13.44 | 96.15% | 11.51 | 95.13% |
| supply activation | 5 working days | 1.20 | 97.38% | 1.47 | 97.46% |
| deactivation of supply on customers request | 5 working days | 1.07 | 97.38% | 1.05 | 98.59% |
| reactivation of supply following disconnection for late payment | 1 working day | 0.05 | 99.56% | 0.10 | 99.52% |
| resumption of the supply following faults of the metering equipment (requests sent during business days from 08:00 to 18:00) | 3 hours | 2.80 | 68.10% | 3.52 | 60.07% |
| resumption of the supply following faults of the metering equipment (requests sent during non-business days or from 18:00 to 08:00) | 4 hours | 2.52 | 87.54% | 2.40 | 86.40% |
| maximum punctuality band for appointments with customers | 2 hours | N.A. | 91.46% | N.A. | 91.70% |
| NON-DOMESTIC CUSTOMERS | | ARETI'S PERFORMANCE | | | |
| estimates for work on LV networks (ordinary connections) | 15 working days | 8.21 | 95.51% | 9.98 | 88.26% |
| completion of simple work (ordinary connections) | 10 working days | 11.47 | 72.55% | 10.98 | 77.57% |
| completion of complex works | 50 working days | 16.66 | 94.59% | 17.55 | 92.49% |
| supply activation | 5 working days | 2.12 | 93.97% | 2.68 | 93.63% |
| deactivation of supply on customers request | 5 working days | 2.41 | 95.46% | 2.28 | 96.07% |
| reactivation of supply following disconnection for late payment | 1 working day | 0.08 | 99.42% | 0.13 | 99.30% |
| resumption of the supply following faults of the metering equip- ment (requests sent during business days from 08:00 to 18:00) | 3 hours | 2.90 | 67.04% | 3.48 | 62.78% |
| resumption of the supply following faults of the metering equipment (requests sent during non-business days or from 18:00 to 08:00) | 4 hours | 2.35 | 86.45% | 2.51 | 84.91% |
| maximum punctuality band for appointments with customers | 2 hours | N.A. | 91.61% | N.A. | 91.13% |
| MEDIUM VOLTAGE SUPPLIES (MV) | | | | | |
| END CUSTOMERS | | ARETI'S PERFORMANCE | | | |
| estimates for work on MV networks | 30 working days | 13.38 | 93.20% | 17.50 | 86.44 |
| completion of simple work | 20 working days | 17.68 | 90.91% | 3.00 | 100% |
| completion of complex works | 50 working days | 14.47 | 96.67% | 9.88 | 92.86% |
| supply activation | 5 working days | 5.44 | 77.78% | 10.52 | 56.53% |
| deactivation of supply on customers request | 7 working days | 12.85 | 69.70% | 19.53 | 67.86% |
| reactivation of supply following disconnection for late payment | 1 working day | 1.00 | 82.35% | 0.42 | 100% |
| maximum punctuality band for appointments with customers | 2 hours | N.A. | 92.05% | N.A. | 92.11% |

| GENERAL LEVELS OF COMMERCIAL QUALITY | | | | | |
|--|--|--|--|--|--|
| SERVICES | ARERA PARAMETERS minimum percentage of services to be performed within a maximum time | average actual completion time for services | percentage of services performed within the maximum time | average actual completion time for services | percentage of services per- formed within the maximum time |
| | | | 2020 | 2021 | |
| LOW VOLTAGE (LV) SUPPLIES | | | | | |
| DOMESTIC CUSTOMERS | | ARETI'S PERFORMANCE | | | |
| reply to written complaints/enquiries written for distribution activities | 95% within 30 calendar days | 40.05 | 60.00% | 85.47 | 50.70% |
| reply to written complaints/enquiries written for measurement activities | 95% within 30 calendar days | 67.68 | 53.43% | 72.46 | 44.72% |
| NON-DOMESTIC CUSTOMERS | | ARETI'S PERFORMANCE | | | |
| reply to written complaints/enquiries written for distribution activities | 95% within 30 calendar days | 44.91 | 56.44% | 59.08 | 66.53% |
| reply to written complaints/enquiries written for measurement activities | 95% within 30 calendar days | 63.03 | 53.66% | 79.03 | 38.46% |
| MEDIUM VOLTAGE SUPPLIES (MV) | | | | | |
| END CUSTOMERS | | ARETI'S PERFORMANCE | | | |
| reply to written complaints/enquiries written for distribution activities | 95% within 30 calendar days | 23.98 | 78.59% | 34.73 | 75.38% |
| reply to written complaints/enquiries written for measurement activities | 95% within 30 calendar days | 150.08 | 25.00% | 136.74 | 20.83% |

Note: the symbol “/” is used when services were not requested during the year, “n.a.” means the data are not applicable.

Table no. 23 – The main specific and general levels of commercial quality – energy sales (2020-2021)
(ARERA parameters and Acea Energia's performance - data reported to ARERA)

ENERGY SALES

| SPECIFIC LEVELS OF COMMERCIAL QUALITY (*) | | | |
|---|--|--|--|
| SERVICES | ARERA PARAMETERS maximum time by which the service must be performed | percentage of services carried out within time limit | percentage of services carried out within time limit |
| | | 2020 | 2021 |
| MORE PROTECTED SERVICE | | ACEA ENERGIA PERFORMANCE | |
| billing adjustments | 60 calendar days | 50.0% | 100% |
| double billing adjustments | 20 calendar days | / | / |
| reasoned reply to written complaints | 30 calendar days | 90.66% | 92.30% |
| FREE MARKET | | ACEA ENERGIA PERFORMANCE | |
| billing adjustments | 60 calendar days | 42.86% | 52.89% |
| double billing adjustments | 20 calendar days | / | / |
| reasoned reply to written complaints | 30 calendar days | 88.73% | 93.08% |
| GENERAL LEVELS OF COMMERCIAL QUALITY | | | |
| SERVICES | ARERA PARAMETERS minimum percentage of services to be performed within a maximum time | percentage of services per- formed within the maximum time | percentage of services per- formed within the maximum time |
| MORE PROTECTED SERVICE | | ACEA ENERGIA PERFORMANCE | |
| reply to written enquiries | 95% within 30 calendar days | 99.65% | 99.72% |
| FREE MARKET | | ACEA ENERGIA PERFORMANCE | |
| reply to written enquiries | 95% within 30 calendar days | 99.33% | 99.64% |

(*) Free market and more protected service customers with low and medium voltage supplies, and end customers of low-pressure natural gas (predominantly domestic customers and small businesses) receive an automatic compensation calculated on a base value of € 25 if standards are not met.
The symbol “/” is used when services were not requested during the year, N.A. means the data are not applicable.

Table no. 24 – Service continuity data – energy distribution (2019-2021) – (ARERA parameters and Areti performance – 2019-2020: data certified by ARERA; 2021: provisional data)

ENERGY DISTRIBUTION – CONTINUITY INDICATORS – LV CUSTOMERS

DURATION OF DISRUPTIONS AND PERCENTAGE CHANGES

| SERVICES | average cumulative duration of long disruptions without prior notice under the operator's responsibility per LV customer per year (minutes) | | | percentage changes | |
|----------------------|---|------|------|--------------------|---------------|
| | 2019 | 2020 | 2021 | 2021 vs. 2019 | 2021 vs. 2020 |
| high concentration | 43.8 | 42.3 | 30.4 | -30.6% | -28.1% |
| medium concentration | 60.1 | 52.0 | 45.5 | -24.3% | -12.5% |
| low concentration | 66.4 | 47.6 | 47.3 | -28.8% | -0.6% |

AVERAGE NO. OF DISRUPTIONS AND PERCENTAGE CHANGES (*)

| SERVICES | average no. of disruptions without prior notice under the operator's responsibility per LV customer per year | | | percentage changes | |
|----------------------|--|-------|-------|--------------------|---------------|
| | 2019 | 2020 | 2021 | 2021 vs. 2019 | 2021 vs. 2020 |
| high concentration | 2.016 | 1.869 | 1.603 | -20.5% | -14.2% |
| medium concentration | 2.525 | 2.589 | 2.459 | -2.6% | -5.0% |
| low concentration | 3.327 | 3.064 | 3.248 | -2.4% | 6.0% |

(*) The yearly average number of disruptions per low voltage customer considers both lasting disruptions (> 3 minutes) as well as short disruptions (≤ 3 minutes but longer than 1 second).
NOTE: the three territorial areas are defined on the basis of the degree of concentration of the resident population: more than 50,000 inhabitants is defined as "high concentration"; between 5,000 and 50,000 inhabitants is defined as "medium concentration"; less than 5,000 inhabitants is defined as "low concentration".

QUALITY IN THE WATER AREA

The Acea Group manages the integrated water service (IWS) in

112 other municipalities⁶³, of which 80 are managed⁶⁴ by Acea



131 Water Kiosks active in territories managed by Acea Ato 2, GORI and AdF: over **30 million litres of water provided**, equal to **601 t of plastic saved per year** and over **1,580 tons of CO₂ prevented** from entering the atmosphere



Envision and CAM to be included in the design of the **interventions of the strategic structures** of Acea Ato 2: **Peschiera and Marcio aqueducts**



Energy for the Sarno: the project launched by GORI **will contribute to restabilising the fluvial ecosystem**

several Optimal Areas of Operations (ATO) or District Areas of Lazio, Tuscany, Campania and Umbria through subsidiaries and investee companies.

Below, in line with the scope of reporting (see Communicating sustainability: methodological note), we describe the activities carried out in **Lazio, Campania and Tuscany** by the following companies:

- **Acea Ato 2**, Acea Ato 2, in ATO 2 - Central Lazio (Rome and

Ato 2, equal to about 94% of the population in the area), the Group's "historical" area of operation⁶⁵, with a pool of residents served of over 3.7 million;

- **Acea Ato 5**, in OTA 5 – southern Lazio – Frosinone (86 municipalities managed⁶⁶ in the area of Frosinone and vicinity, equal to about 95% of the population), for about 455,000 residents served;
- **GORI** operates in the Sarnese-Vesuviano district (in 76 munic-

⁶³ In July 2021, with Regional Council Resolution No.10, the Optimal Territorial Area 2 - Central Lazio-Rome was modified to include the Municipality of Campagnano di Roma, which previously belonged to ATO 1 - North Lazio-Viterbo.

⁶⁴ In 80 municipalities, equal to about 94% of the population in OTA 2 – Central Lazio, Acea Ato 2 managed the entire IWS (aqueduct, sewerage and waste water treatment), and the IWS was partially managed in another 17 municipalities.

⁶⁵ Acea was entrusted with the running of the capital's aqueduct service since 1937, the water treatment system since 1985 and the entire sewerage system since 2002, effective 1 January 2003.

⁶⁶ Including the management of two municipalities outside the area (Conca Casale and Rocca d'Evandro).

ipalities - 59 in the province of Naples and 17 in the province of Salerno - of which 74 are managed), with approximately 1.4 million residents served;

- **Gesesa** operates in the ATO - Calore Irpino (22 municipalities managed, in the area of Benevento and province), with more than 110,000 residents served.
- **AdF** - in the reporting perimeter from this year - operating in the ATO 6 Ombrone that includes 55 municipalities (28 in the province of Grosseto and 27 in the province of Siena) with a population of more than 380,000.

The integrated water service (IWS) involves the **entire cycle of drinking water and wastewater**, from the collection of water from the springs until its return to the environment, and is regulated by a **management agreement** signed **between the Company that takes charge of the service and the Area Authority** (AGB - Area Governing Body). The Regulatory Authority for Energy, Networks and the Environment (ARERA), which also regulates the water sector at a national level, has defined the minimum essential contents of the "**Standard Agreement**" **between the entrusting bodies and the service operators**. For the main regulatory interventions in the water sector undertaken during the year by ARERA, see paragraph *Context analysis and business model* (Group Profile chapter), and for more details see the Authority's website.

The **Integrated Water Service Charter**, annexed to the Agreement, defines the **general and specific quality standards** that the operator must respect in relation to the users, in compliance with the ARERA Resolutions on **contractual quality and technical quality aspects**. The **User Regulations**, also annexed to the Agreement, govern the **relationship with customers**, establishing the technical, contractual and economic conditions that are binding for the operator in the provision of services. For the **contractual quality performance** of water companies, see below the sub-section *Levels*

of quality regulated by ARERA in the water segment.

The **management activities** of the integrated water service, **though** closely related and therefore allowing **an optimal definition of the processes**, must relate to **situations that are very diversified** from the standpoints of sale, demographics, geomorphology and hydrology **of the regions served**, which also have an impact on the infrastructure to be implemented. The Companies operate in compliance with the procedures of the **certified management systems**, in particular, for Acea Ato 2, Acea Ato 5 and Gesesa in the areas of Quality, Environment, Safety and Energy, for GORI in the areas of Quality, Environment and Safety and for AdF in the areas of Quality and Safety (see, for further details, The corporate identity, The management systems).

CONSISTENCY, INTERVENTIONS AND REMOTE CONTROL

The companies managing the IIS are engaged in progressive **digitising of the networks**, through studies, field surveys and **data entry into the geo-referenced information system** (GIS). In particular, at 31/12/2021, **Acea Ato 2** has **over 85% of the networks traced in the GIS system**; **Acea Ato 5** has digitised **about 4,917 km** of the water network at 31/12/2021 and in 2021 completed the surveys on another 925 km (24 municipalities). **GORI** and **Gesesa** have geo-referenced the stocks shown in Table 25 and are continuing to survey and update the data; Gesesa has already geo-referenced the **water sites** (wells, springs, reservoirs/partitions) and the **sewage lifting and treatment plants**, including their functional diagrams.

In 2021, **AdF** activated a process of geo-referencing the reclaimed pipelines, which made it possible to map the entire database of replaced pipelines, equal to about 38.55 km on the aqueduct and about 1.63 km on the sewerage system.

Table no. 25 - Water mains areas 2021 (geo-referenced data)

| company | drinking water network (km) | sewerage network (km) |
|-------------------|---|---|
| Acea Ato 2 | 13,152 (723.4 km of aqueduct, 1,127 km of supply network and 11,301 km of distribution) | 6,217 |
| Acea Ato 5 | 6,027 (1,207 km of supply network and 4,820 km of distribution network) | 1,776 |
| GORI | 5,215 (865 km of supply network and 4,350 km of distribution network) | 2,625 |
| Gesesa | 2,063 (174 km of supply network and 1,889 km of distribution network) | 523 (among outfalls, main and secondary collectors) |
| AdF | 8,328 (1,993 km of supply network and 6,335 km of distribution network) | 1,746 (among outfalls, main and secondary collectors) |

The networks are connected to a complex system of equipment and plants necessary for the operations of the aqueduct, treatment and sewerage services. Each year, the Companies carry out:

- **infrastructure interventions such as modernisation** or strengthening of the plants the **remote control of infrastructures, the completion, extension or the drainage of pipelines and networks**, to contain the losses and improve the efficiency and quality of the service provided;
- **interventions to improve utility management** (such as installation and replacement of meters), in addition to everything concerning the relationship with customers, for which reference is made to the paragraph *Customer care*);
- **interventions to protect people and territory, aimed at ensuring the quality of the drinking water distributed and the water returned to the environment** (such as Water Safety Plans - WSPs - and laboratory controls; see also the section *Relations with the environment* and the chapter *Institutions and the Company*).

For a quantification of the main interventions carried out by the companies during the year and the analytical checks on drinking water and waste water carried out independently or by Acea Elabiori, see Table 26.

Acea Ato 2 pursues security and **greater resilience of the supply system managed**, in compliance with the Concession flows. In particular, under Ministerial Decree No. 517 of 16 December 2021 "Investments in primary water infrastructures for the security of water supply", Acea Ato 2 obtained funding of € 150 million as the implementer of four strategic interventions⁶⁷ within the broader project of making Rome's water supply safe and modernising it; see also the box - *Interventions on strategic infrastructures, Peschiera - Le Capore and Marcio aqueducts: making them safe and authorisation procedures* - paragraph Protection of the territory and safeguarding biodiversity in *Relations with the environment*. The **design** of strategic infrastructures is also defined, in collaboration with **Acea Elabiori**, with **specific attention to sustainability criteria** (see box with details).

67 These are the "New Marcio Aqueduct - Lot I", the "Raddoppio VIII Syphon - Casa Valeria Section - Ripoli Tunnel Exit - Phase I", the "Ottavia - Trionfale Supply System" and the "Monte Castellone - Colle S. Angelo (Valmontone) Pipeline".

STRATEGIC INFRASTRUCTURES OF ACEA ATO 2: ENVISION AND CAM FORESEEN IN THE DESIGN

On the new upper section of the **Peschiera Aqueduct**, design activities continued in order to obtain environmental authorisations and **Envision Certification** - the first rating system for building sustainable infrastructures; a methodological approach was defined and applied to **estimate the CO₂ emissions** generated by the infrastructure construction activities. For the **Marcio aqueduct**, a **Sustainability Report** was prepared in compliance with EU Regulation

852/2020 on the European taxonomy, in order to verify compliance with the principle of "not causing significant damage", and with the reference regulations of the NRRP. In addition, the document containing the prospective indications for sustainable engineering and **for the application of the Minimum Environmental Criteria (CAM) for both infrastructures is being further developed.**

In 2021, Acea Ato 2 **installed 144 hydro valves** to optimise the operating pressures of the distribution networks and **reclaimed 203.4 km of water mains**; it started **work on major supply systems** to increase the resilience of complex municipal systems; to increase the availability of water in the municipalities of Castelli Romani, it

completed the new drinking water plants serving the Madonna di Coccio and Camporesi wells in the municipalities of Castel Gandolfo and Ciampino. The programme to install flow-limiting devices on rural utilities has also continued to limit non-drinking consumption.

Table no. 26 – Main interventions on the drinking water and sewerage networks and controls on drinking water and wastewater (2021)

INTERVENTIONS ON DRINKING WATER NETWORKS, METERS AND WATER TESTS

type of work

ACEA ATO 2

| | |
|--|---|
| interventions due to network failure/leak detection | 35,313 interventions (34,904 due to faults, 409 leak detection) |
| meter installations (new installations and replacements) | 15,807 interventions (12,233 new installations and 3,574 replacements) and 135,448 massive replacements with contract |
| network extension | 203.39 km of expanded network |
| network reclamation | 10.10 km of reclaimed network |
| drinking water quality control | 11,926 samples collected and 346,164 tests performed |

ACEA ATO 5

| | |
|--|---|
| interventions due to fault | 11,046 interventions of repair |
| planned interventions | 1 intervention (on supply network) |
| meter installations (new installations and replacements) | 30,103 interventions (3,082 new installations and 27,021 replacements) |
| network extension | 0 km of expanded network |
| network reclamation | 31.7 km of reclaimed network |
| drinking water quality control | 2,530 samples collected and 105,430 tests performed |

GORI

| | |
|--|---|
| interventions due to network failure/leak detection | 15,604 interventions (13,767 due to faults, 1,837 leak detection orders) |
| planned interventions | 7,065 interventions |
| meter installations (new installations and replacements) | 26,194 interventions (12,937 new installations and 13,257 replacements) |
| network extension | 0.23 km of expanded network |
| network reclamation | 14.07 km of reclaimed network |
| drinking water quality control | 4,903 samples collected and 136,156 tests performed |

GESESA

| | |
|--|---|
| interventions due to network failure/leak detection | 4,340 interventions (4,104 due to faults, 236 leak detection) |
| planned interventions | 56 interventions |
| meter installations (new installations and replacements) | 3,190 interventions (1,113 new installations and 2,077 replacements) |
| network extension | 3 km of expanded network |
| network reclamation | 1.4 km of reclaimed network |
| drinking water quality control | 828 samples collected and 11,955 tests performed |

AdF

| | |
|--|---|
| interventions due to network failure/leak detection | 8,836 interventions (8,200 due to faults, 636 leak detection) |
| planned interventions | 71 interventions |
| meter installations (new installations and replacements) | 38,686 interventions (3,518 new installations and 35,168 replacements) |
| network extension | 1.8 km of expanded network |
| network reclamation | 48 km of reclaimed network |
| drinking water quality control | 4,757 samples collected and 139,634 tests performed |

INTERVENTIONS ON SEWERAGE NETWORKS AND TESTS

type of work

ACEA ATO 2

| | |
|--------------------------------------|---|
| interventions due to network failure | 3,302 interventions |
| planned interventions | 172 interventions |
| network extension | 8.23 km of expanded network |
| network reclamation | 17.6 km of reclaimed network |
| wastewater quality control | 6,646 samples collected and 127,417 tests performed |

ACEA ATO 5

| | |
|--------------------------------------|--|
| interventions due to network failure | 655 interventions |
| planned interventions | 1 intervention |
| network extension | 0 km of expanded network |
| network reclamation | 1.6 km of reclaimed network |
| wastewater quality control | 3,044 samples collected and 40,636 tests performed |

GORI

| | |
|--------------------------------------|--|
| interventions due to network failure | 545 interventions |
| planned interventions | 6,576 interventions |
| network extension | 1.11 km of expanded network |
| network reclamation | 4.25 km of reclaimed network |
| wastewater quality control | 1,584 samples collected and 43,270 tests performed |

GESESA

| | |
|--------------------------------------|--|
| interventions due to network failure | 203 interventions |
| planned interventions | 7 interventions |
| network extension | 0 km of expanded network |
| network reclamation | 0.05 km of reclaimed network |
| wastewater quality control | 489 samples collected and 11,448 tests performed |

AdF

| | |
|--------------------------------------|--|
| interventions due to network failure | 373 interventions |
| planned interventions | 41 interventions |
| network extension | 0 km of expanded network |
| network reclamation | 2.6 km of reclaimed network |
| wastewater quality control | 7,372 samples collected and 51,707 tests performed |

Acea Ato 2's aqueducts and supply network are equipped with **remote-control systems: meters and sensors** connected to the field equipment provide the **central system** with useful information on the condition of the network and its operation (system set-up, pump and valve status, hydraulic, chemical, physical and energy measurements), **highlighting any alarms** and offering the possibility of **remote operation**, such as turning pumps on or off, opening, closing or adjusting valves. Rome's particularly complex distribution network is fed by water centres, where remote control has been implemented extensively. The number of **water centres** and **points on the network** that have been partially or fully **remote-controlled** has **further increased**: at the end of 2021, there were **1,019** remote-controlled **plants** on the collection and distribution network (springs, wells, aqueducts, supply systems, water centres, drinking water treatment plants) and a further **1,662** remote-controlled ones along the distribution network (1,066 districtisation points, 106 water kiosks and 490 network pressure measuring points, including 319 hydro valves and 171 pressure points). Of these, 355 are equipped with **water quality** measurement systems. **For** the sewage system the progressive remote control of the entire sector is very advanced **which intervenes on both central systems and plants** (large and small treatment plants and sewage lifting plants): **the main treatment plants are already remotely controlled through on-site rooms** and further work to upgrade the technology and connect them to the central room is in progress. The water sites managed by **Acea Ato 5** - including supply sources, distribution plants, sewage lifting stations and purification plants -

are partly **equipped with remote control**, which makes telemetry, remote command and control possible, as well as the detection of hydraulic (water flow rate, network pressure, tank level, operating status of electric pumps), electrical and qualitative (turbidity and residual chlorine) parameters. At the end of 2021, there **were 331 plants with a remote-control system installed** (equipped with hydraulic measurements - flow rates, pressure and levels -, 16 of which were also equipped with **water quality control**) and **111 network points** (with continuous pressure or flow monitoring systems). **The plants** managed by GORI, relating to the drinking water, sewage and purification systems, **are all equipped with remote-control systems**; as at 31/12/2021, there were a total of **677 plants**, of which 269 water sites and 203 water network nodes, 195 sewage sites and 10 purification sites, at which the same activities as indicated above for Acea Ato 5 are carried out. At **GORI's** plants, a local control system provides automated management (with human intervention only in emergencies) of electric pumps and valves according to a logic of energy efficiency and saving of water resources; in the largest reservoirs, outflow control valves are installed and remotely controlled, for dynamic adjustment of the quantity of resource supplied based on different water availability scenarios; finally, the progressive application of **IoT technologies** in nodes of the water and sewerage networks where **electricity is absent** allows essential network parameters (pressures and flows) to be monitored. **Gesesa** has continued the programme of installing the remote-control system at the water sites it manages; in particular, in 2021 it **completed the implementation of remote control on 4 sewage lift-**

ing stations and started the installation of an alarm system on all the purification plants. It has also been awarded the works for upgrading and securing several of the water plants it manages. **AdF** has also continued the progressive implementation of remote control on its plants, **extending it to 45 more aqueduct sites in 2021**. Constant monitoring of the networks (district flow measurements and control valves) and of the smaller reservoirs makes it possible to reduce inefficiencies; the automatic instruments installed on the pumping systems of the sewage lifts also facilitate predictive maintenance, frequency analysis of alarms, and the status of priority process meters for management and budgetary purposes. Work continued during the year on the implementation of automatic regulation of the network, depending on pressure conditions, and testing of battery-powered pressure and flow rate sensors with NB-IoT technology, and their management and analysis platform.

The issue of **limiting losses on distribution networks** is carefully monitored by all Group companies, which are committed to the sustainable management of the water cycle; to this end, **organisational structures dedicated to protecting the resource** have been set up. The companies carry out **districtisation, inspection and rec-lamation** of the networks, installation of automatic valves and other pressure control instruments, as well as verification and calibration of meters, **identification of abnormal consumption** and also initiatives to combat illicit connections and improper use of the resource. The specific activities undertaken in 2021 by each company are illustrated in the dedicated chapter Water Segment in the section *Relations with the environment*, to which reference should be made.

UTILITY MANAGEMENT AND SERVICE CONTINUITY

The companies continued in 2021 with the **installation of new meters and the replacement of old ones** (see figures in Table 26). As part of its **mass meter replacement activities**, **Acea Ato 2** has continued its experience in the field of IoT, "Water meter remote reading development", in collaboration with Areti, which has led to

the development and testing of a patented product called "Proteus". During the year, a total of **about 17,000 Proteus NB-IoTs** were installed and put into operation on as many water users and public fountains in Rome. In 2021, around **1,100 meters were brought into remote reading mode**, bringing the total number of installed remote reading meters to over 30,000 as of 31/12/2021.

In addition, **Acea Ato 2** focused during the year on **a diversified remote meter-reading strategy**, which includes the introduction of **specific solutions** according to different installation requirements. In fact, in addition to Proteus NB-IoT devices, the company has started **both the procurement of integrated market meters** – devices with ultrasound technology that allow for taking measurements and remote reading – **and the design and development of a new advanced smart metering system for the water service**, from which benefits are expected in terms of, for example, optimisation of data quality and quantity, maximisation of the use of communication technologies, and cybersecurity.

AdF continued to massively implement **remote reading of meters in the area**, through drive-by and walk-by reading, installing **over 38,000 meters in 2021** and achieving **coverage of 50% of the entire fleet of meters**; the work carried out in Grosseto, Follonica and Orbetello made it possible, in fact, to almost complete the largest municipalities managed. The solution installed makes it possible to increase the frequency of readings and facilitate data collection. **AdF** has also **created a platform for analysing, checking and monitoring** data from remote reading which, by also integrating data collected by fixed and mobile concentrators, will allow greater control of the flows supplied and network balance.

The **continuity of the water supply** is one of the fundamental service parameters for customer satisfaction, which has been subject to regulation by the ARERA. Table no. 27 shows the data of the last three years relating to **disruptions and water reductions, urgent** (due to accidental breakdowns of pipelines or plants, energy interruption, etc.) **or planned**, for the Companies in question.

Table no. 27 – Number, type and duration of disruptions in the supply of water (2019-2021)

| type of disruption | 2019 | 2020 | 2021 |
|-------------------------------------|--------------|--------------|--------------|
| ACEA ATO 2 (*) | | | |
| urgent disruptions (no.) | 1,304 | 1,207 | 881 |
| planned disruptions (no.) | 204 | 212 | 341 |
| total disruptions (no.) (**) | 1,508 | 1,419 | 1,222 |
| suspensions lasting > 24hrs (no.) | 170 | 196 | 147 |
| ACEA ATO 5 | | | |
| urgent disruptions (no.) | 428 | 521 | 691 |
| planned disruptions (no.) | 338 | 568 | 397 |
| total disruptions (no.) (**) | 766 | 1,089 | 1,088 |
| suspensions lasting > 24hrs (no.) | 0 | 0 | 0 |
| GORI (*) | | | |
| urgent disruptions (no.) | 1,755 | 3,042 | 2,629 |
| planned disruptions (no.) | 218 | 103 | 59 |
| total disruptions (no.) (**) | 1,973 | 3,145 | 2,688 |
| suspensions lasting > 24hrs (no.) | 0 | 0 | 0 |

GESESA (*)

| | | | |
|-------------------------------------|------------|------------|-----------|
| urgent disruptions (no.) | 107 | 90 | 17 |
| planned disruptions (no.) | 31 | 57 | 19 |
| total disruptions (no.) (**) | 138 | 147 | 36 |
| suspensions lasting > 24hrs (no.) | 3 | 1 | 8 |

AdF (*)

| | | | |
|-------------------------------------|--------------|--------------|--------------|
| urgent disruptions (no.) | 1,978 | 2,378 | 2,155 |
| planned disruptions (no.) | 179 | 390 | 468 |
| total disruptions (no.) (**) | 2,157 | 2,767 | 2,623 |
| suspensions lasting > 24hrs (no.) | 175 | 48 | 64 |

(*) The 2020 figures for Acea Ato 5, AdF and GORI have been consolidated. The 2021 figures for Acea Ato 2, GORI, Gesesa and AdF and Gesesa are still being consolidated. Any adjustments, after data consolidation, will be reported in the next reporting cycle.

(**) As envisaged by the Authority, total disruptions include both shutdowns (due to damage to pipes/pipelines and network changes) and interruptions due to disruptions and system anomalies. The number of total out of service cases is therefore used for the calculation.

WATER DISTRIBUTED AND RETURNED TO THE ENVIRONMENT

The quality of the drinking water distributed mainly safeguards aspects related to health and safety of the community and is therefore an essential element of the service. The same approach also applies, however, to the water returned to the receiving water bodies, as regards safeguarding ecosystems. Consequently, all the Companies independently carry out controls on drinking and wastewater using internal laboratories or with the support of the Acea Elabiori Group Company (see Table no. 26).

In particular, tests on water intended for consumption are carried out on samples collected from springs and wells, supply plants, reservoirs and along distribution networks, as well as samples collected for extraordinary testing (users, local health authority requests, etc.) and specific parameters (e.g. radioactivity). Test frequency and sampling points are defined taking into consideration the volumes of water distributed, population served, network and infrastructure conditions and specific characteristics of local springs (see also *Environmental relations*).

All the Water Operations Companies in the group have started preparations or begun to implement **Water Safety Plans (WSP)**, aimed at **preventing and reducing the risks inherent to the drinking water service**; the activities in question, conducted in 2021, are illustrated in the dedicated (Water Safety Plans - WSP) section of the Water Segment chapter in the Environmental relations section, to which reference should be made.

As regards the territory managed by Acea Ato 2, the spring water collected to supply the Rome and Fiumicino area presents levels of excellent quality at the source, while in the Castelli Romani area and other areas of upper Lazio, the volcanic nature of the terrain adds mineral elements to the aquifer such as fluorine, arsenic and vanadium, in concentrations exceeding those envisaged by the law. For some time, Acea Ato 2 has been working to resolve these issues, such as by decommissioning some local sources of supply and replacing them with higher quality springs. In 2021, in particular, Acea Ato 2 **built new drinking water plants** and upgraded/expanded existing plants in the municipalities of Marino, Castel Gandolfo, Ariccia, Rignano Flaminio, Civitavecchia and Pomezia. It has also **started work on aqueduct interconnections** that will ensure greater network resilience and improve the service provided.

In 2021, AdF **implemented the first phase** of the project planned

in 2020 to **monitor the quality of supply sources** with **online instrumentation**. The installation of the instruments, the acquisition of the remote-control signals and the preparation of the relative **control/reporting dashboards** were carried out, through which it is possible to **integrate the qualitative data** collected with **quantitative information** and with the **meteorological and hydrogeological information** made available online by the related regional services, updated on a daily basis. During the year, the first **8 supply sources** were monitored, which together provide approximately **68% of the water resource distributed by AdF**; these include the Santa Fiora springs, and advanced monitoring of the **arsenic** parameter, using a high-tech analyser tested in 2020, in the water of the Galleria Alta spring is planned. The project envisages monitoring around 75% of the resources drawn from the environment, leaving out only small and very small sources, whose suitability for online monitoring can be assessed on a case-by-case basis.

The installation of online measurement systems and the uptake of remote control makes it possible to continuously monitor the quality of the water and activate **early warning** systems as provided for in the new quality guidelines for the safety of drinking water specified by the recent European Directive 2020/2184.

GORI supplies its users with quality water, collected from deep wells. The qualitative characteristics of the water distributed are verified by the internal "Francesco Scognamiglio" laboratory, located in Pomigliano d'Arco, which uses cutting-edge instruments, including a spectrometer capable of determining **all the metals** indicated by the regulations in force on drinking water. The introduction of this equipment has made it possible to reduce the time required to carry out analyses and to reduce laboratory consumables, reagents, the quantity of technical gas and electricity consumption.

Gesesa participates in the technical round table, together with the Campania Water Authority, local, provincial and regional institutions, and Arpac and the local health authorities, dedicated to the monitoring and characterisation of the groundwater resource that, through the Campo Mazzoni and Pezzapiana wells, supplies the city of Benevento. In the previous two years it carried out an extraordinary control plan for the tetrachloroethylene parameter in the groundwater, finding concentrations below the values imposed by the reference legislation. In 2021, Gesesa **launched a project** aimed at creating an **activated carbon filtration system** for the treatment of drinking water at the Benevento water plant (see the dedicated box in Relations with the environment, Water area, paragraph Water quality).

In 2021, there were **131 water kiosks active (106 of Acea Ato 2, of**

which 31 in the City of Rome and 75 in the province of Rome, **20 of GORI** and **5 of AdF**, which has another 2 in the start-up phase); these are dispensers of chilled natural or sparkling water, installed throughout the territory, **available to citizens and tourists**, free of charge or at minimal cost. The water distributed is the same as the aqueducts and the quality is certified by regular checks conducted by the companies and the relevant local health authorities. The initiative met with a **positive response** and in **2021**, the "kiosks" **supplied a total of over 30 million litres of water** (about 26.8 million litres from Acea Ato 2, about 3.2 million litres from GORI and about 35,000 litres from AdF water kiosks), with a percentage of sparkling water of about 56%. The **environmental benefits** are clear: **the litres dispensed are equivalent to 601 tonnes of plastic saved over the year** (equal to over 20 million 1.5 litre bottles) and **over 1,580 tonnes of CO₂ not emitted into the atmosphere** (around **63% more** than the 2020 figure of 968 tonnes of CO₂ avoided), due to the lack of bottle production⁶⁸ and net of emissions due to the energy consumption of the kiosks⁶⁹ and the CO₂ added to obtain sparkling water.

Acea Ato 2, by virtue of the new installation plan approved by the OTS, **will be able to install a further 100 water kiosks**; the company **has also undertaken a project** for the installation and maintenance of water kiosks and dispensers **on behalf of third parties**, which in 2021 allowed it to install two water kiosks and one dispenser at LUISS

University, one at the Quirinale and one at the Ministry of Economy and Finance.

Acea Ato 2 is also responsible for water up to the "point of supply" for the **drinking water fountains** in the territory of Rome. Launched by Acea in 2020, the **Waidy app** makes it possible to **identify the water supply points** located throughout the territory. In 2021 it was renamed **Waidy Wow** and **underwent evolution** aimed at improving the user experience, becoming a **complete tool with better performance**. The graphical interface has been improved and **the number of water points mapped across the country has increased to over 50,000**; a feature has been made available that allows the user to add a new water point directly. Artistic, cultural and historical content has been expanded to enhance the area, and news and in-depth articles on sustainability have been added in order to involve users and **create a community** attentive to environmental and social issues. A feature allows users to identify **personalised routes by following the "waterways"** (drinking fountains, artistic fountains, water kiosks) or to access pre-set thematic routes and related multimedia content. Finally, the app gives access to a "Web radio", a channel dedicated to infotainment with 24-hour music programming and the inclusion of "short videos on sustainability" in collaboration with LifeGate.

THE PERCEIVED QUALITY OF DRINKING WATER, RESULTS OF THE 2021 SATISFACTION SURVEYS

Acea **measures customer habits and perceptions regarding the quality of the drinking water supplied**. The customer satisfaction surveys, carried out twice a year, include not only an overall opinion on water quality but also an in-depth analysis of the subject. The outcomes presented below are **the average of the two surveys**.

For **Rome and Fiumicino**, where the service is managed by **Acea Ato 2**, the **overall opinion on taste, smell and clarity of drinking water** expressed by the sample of respondents remains **stable and high** at **7.6/10** (it was 7.7/10 in 2020); **39.2%** of those interviewed, a figure that is down compared to 2020 (46%), **state that they habitually drink the water that comes to their homes**, while **28%**, the same percentage as in 2020, **state that they never drink it**; among the **reasons given** by those who never drink water at home, 49.4% continue to be the habit of drinking mineral water, while 27.2% responded that it is "not good for my health".

The surveys carried out in 2021 in the **other areas of Lazio** where Acea Ato 2 operates used a larger sample of respondents than in 2020, representing different and larger areas, so the results are not directly comparable. The surveys showed that the **overall satisfaction** rating for water quality **in the province is 6.8/10**; 25.1% **say they drink tap water regularly** and **45.9% never drink it**; for 38.6% of the latter, the reason is related to their habit of drinking mineral water, while 25% say "it's not good for my health".

For **Acea Ato 5** customers in Frosinone and vicinity, in 2021 the overall opinion expressed on drinking water came to **6.1/10** (it was 6/10 in 2020). **The percentage of respondents** stating that they **habitually drink** tap water remains limited and is decreasing at **17%** (it was 21% in 2020), while the percentage of those stating that they **never drink it**, equal to **54.9%** is high, although decreasing with

respect to 2020 (59%). For the latter, the main reasons given were the habit of drinking mineral water for 34.3% and "not good for my health" for 34.1%.

In the Sarnese Vesuviano district, the overall opinion on drinking water expressed by **GORI's** customers in 2021 remains stable at **6.2/10** (6.1/10 in 2020), as do the percentages of **respondents** who say they **habitually drink** tap water, **23%** (same figure as in 2020) and **never drink it**, 52.4% (slightly down from 53% in 2020). The main reasons cited by those who do not prefer tap water are 'it's not good for my health', for 30.2%, and 'I don't like the taste', for 24.1%. For customers of **Gesesa**, in Benevento and province, the overall opinion expressed on the quality of drinking water is **6.9/10** (6.6/10 in 2020); **continuing its upward trend**, although only slightly, is the percentage of customers who **say they drink tap water regularly, which was 16.6% in 2021** (against 13% in 2020) with a slight decrease in the percentage of those who state that they never drink it, which came to **55.6%** (against 56% in 2020); in this area also, the prevailing reasons given were "it is not good for my health", 39.5% of the respondents and "I am accustomed to drinking mineral water", 36.9% of respondents.

For customers of **AdF**, operating in the province of Grosseto and Siena, the overall opinion expressed on drinking water remains stable and was **6.9/10** (compared with 7/10 in 2020). The percentage of respondents who say they **habitually drink tap water, 36.9%**, has increased slightly (**35%** in 2020) and the percentage who say they **never drink it** (45% in 2020) has decreased more significantly to 40.2%, because "I don't like the taste" in 33% of cases, and because they are used to drinking mineral water in 29.8%.

⁶⁸ The figure, although significant, is certainly underestimated because it does not take into account the emission savings induced by not transporting the bottles by road/rail.

⁶⁹ Consumption data of the AdF water kiosks managed by the municipalities are not available.

The collection of wastewater and its treatment prior to being returned to the environment takes place through a complex system and a configuration organised by “areas” comprising wastewater treatment plants, sewerage networks connected thereto and the associated pumping stations. Acea Ato 2 manages 676 sewage lifting plants, 166 purification plants and more than 7,000 km of sewerage networks (of which 6,217 km mapped on GIS); in 2021, the company continued with its plan to centralise the purification plants, for the work carried out, see the box in the Water Area chapter of the section Relations with the environment.

The Acea Ato 2 Environmental Operations Centre constantly monitors data recorded remotely using cutting-edge technology relating to hydrometric and rainfall information for the Rome area, shared with the Rome Hydrographic and Tide Gauge Operations Office, as well as data on the quality of water of the water bodies: In 2021, 366 samples were taken at 32 sampling points on the Tiber and Aniene rivers and on Lake Bracciano.

In the territory of the municipality of Rome, Acea Ato 2 also man-

ages the lifting plants and tanks for the watering network and the non-drinking water network supplying the water features of the most important artistic fountains. In particular 9 of the main artistic and monumental fountains of the capital: the Triton Fountain, the three fountains in Piazza Navona – the Fountain of the Four Rivers, the Moor Fountain and the Fountain of Neptune – the Trevi Fountain, the Fountain of Turtles, the Fountain of Moses, the Fountain of the Naiads.

The infrastructure of the water treatment and sewerage service managed by Acea Ato 5 includes, as at 31/12/2021, 229 sewage lifting plants, 127 purification plants and approximately 1,776 km of dedicated networks. GORI manages 2,625 km of network serving the water treatment and sewage system and 10 purification plants some serving individual municipalities and others serving inter-municipal areas of Sarnese-Vesuvius agriculture. In 2021, GORI undertook a major project to complete the sewerage and purification works in the Sarno hydrographical basin (see the dedicated box).

GORI LAUNCHES THE *ENERGIES FOR THE SARNO* PROJECT

The Campania Region, through the Ente Idrico Campano (Campania Water Authority), has identified GORI as the implementing party for the completion of the sewage and water purification works in the Sarno hydrographical basin in the Sarnese Vesuviano district in 2020.

The *Energies for the Sarno* project, which began in 2021, will have a significant environmental impact through the gradual completion of the sewage network and the consequent collection for purification, creating the conditions – with the elimination of polluting discharges – to re-establish the river ecosystem with consequent positive effects on the entire area and the Gulf of Naples, as well as on the health of agricultural products and the health of citizens, around 800,000 people living in the 33 municipalities of the basin, plus those living in neighbouring municipalities. GORI has undertaken the project with a remarkable involvement of local stake-

holders, in addition to the 33 municipalities involved in the project, also the canning industry and the environmental association Marevivo Non-Profit Organisation, with the aim of setting up participatory dialogues and synergistic collaborations. Four permanent round tables have been set up on different levels of action: planning and carrying out works, combating illegal discharges, preventing flooding and shared communication. Participatory involvement was also extended to customers with the first phase of the “A click for the Sarno” campaign, through which GORI set aside € 1 for each subscription to the “web bill” service to implement initiatives aimed at rehabilitating the river. More than 19,000 users signed up during 2021. The corresponding amount will be allocated to projects to be implemented, identified with Marevivo and shared with the mayors, which will be voted for by the users who participated in the campaign, in a contest launched by GORI.

As at 31/12/2021 the infrastructure of the water treatment and sewerage service managed by AdF included 291 sewerage lifting plants, 149 purification plants (and 153 Imhoff tanks) and over 1,746 km of sewerage networks. In the ATO in which Gesesa operates, the infrastructure managed by the company includes 19 sewerage lifting plants, 30 treatment plants and 523 km of dedicated networks. For the city of Benevento, the Municipality of Benevento is still planning the design of a centralised treatment plant, including connection outfalls.

QUALITY LEVELS REGULATED BY ARERA IN THE WATER SECTOR

The Regulatory Authority for Energy Networks and Environment (ARERA) defines the specific and general levels of contractual quality for the water sector⁷⁰. With resolution 547/19, the Authority amended and supplemented the previous regulations outlining an incentive system divided into bonuses and penalties to be attributed from 2022 based on operators’ performance. In view of the

distribution of the incentives, in addition to calling for controls on operators on this issue, at the end of 2021 the Authority issued for consultation the update to the methods used to verify contractual quality information for the integrated water service with regards to control procedures and penalty amounts. Additionally, with resolution 639/2021 of 30 December, the Authority established certain flexible elements in the mechanisms used to assess contractual quality performance, including cumulative evaluation of quality objectives on a two-year basis (2022-2023).

Coinciding with the introduction of the new contractual quality incentive system, the water tariff method for the third regulatory period (2020-2023), regulated by Resolution 580/2019/R/Idr, did not maintain the possibility, already provided for the previous regulatory four-year period⁷¹, of accessing premiums relating to contractual quality in the event of the achievement of improved quality standards with respect to those defined at the national level by Resolution 655/2015/R/Idr. Acea Ato 2 has in any case maintained the improved levels of contractual quality standards, as defined by the application submitted in 2016 by the Area Governing

⁷⁰ For most of the services the regulation of contractual quality aspects is in force from July 2016 according to resolution 655/15/R/Idr or RQSII (*Regulation of the contractual quality of the integrated water service*).

⁷¹ Contractual quality premiums related to the achievement of improved quality standards with respect to those defined in Resolution 655/2015/R/Idr were introduced by Resolution 664/2015/R/Idr on the Integrated Water Service Tariff Method for the second regulatory period (2016-2019).

Body (Conference of Mayors of ATO 2 Central Lazio) and accepted by ARERA, and by the amendments subsequently made by resolution 4/20 of the Conference of Mayors relating to the updating of the Service Charter. In particular, the improvement standards concern **39 indicators out of the 47 established by the resolution. For some services** envisaged in the Service Charters attached to their respective concession agreements, **Acea Ato 5 and AdF also pursue and have maintained standards that are better than those imposed by the Authority.**

The timing of the delivery of data on specific and general contractual quality levels to the Authority shall be subsequent to the publication of this document. Therefore, **unconsolidated data for all companies are presented here**, based on the best estimates avail-

able at the time of publication, and are intended as **indicative of performance trends**; consolidated data will be published in the next reporting cycle (see Tables 28-32).

There is a mechanism for **automatic compensation of customers** in the event of non-standard performance on "specific" indicators, the value of which varies according to the delay in performance (see also the box describing investigations, rewards and penalties in the chapter Institutions and the Company).

The water companies, as required by the Authority, **communicate commercial performance data to users in their bills once a year**, Acea Ato 2, Acea Ato 5 and AdF also publish them online, and all publish **information on the quality of the drinking water distributed** on their websites.

Table no. 28 – The main specific and general levels of contractual quality in the water segment (2020-2021) – Acea Ato 2 (ARERA parameters, improvement standards and Acea Ato 2 performance - 2020 figures are consolidated, 2021 figures are not consolidated)

ACEA ATO 2 - CONTRACTUAL WATER QUALITY SEGMENT

SPECIFIC LEVELS OF QUALITY

| SERVICES | ARERA STANDARDS | ACEA ATO 2 IMPROVEMENT STANDARD | average actual completion time for services | degree of compliance | average actual completion time for services | degree of compliance |
|--|-----------------|---------------------------------|---|----------------------|---|----------------------|
| ACEA ATO 2 PERFORMANCE | | | | | | |
| | | | 2020 | | 2021 | |
| estimate for water connection with inspection | 20 working days | 15 working days | 5.7 | 98.0% | 5.9 | 98.1% |
| estimate for sewage connection with inspection | 20 working days | 15 working days | 3.5 | 100.0% | 3.7 | 98.7% |
| execution of the water connection with simple work | 15 working days | 10 working days | 6.7 | 95.9% | 4.3 | 100.0% |
| execution of the sewage connection simple work | 20 working days | 15 working days | / | / | 8.3 | 100.0% |
| supply activation | 5 working days | 3 working days | 5.8 | 88.0% | 2.9 | 94.3% |
| reactivation or takeover of the supply without changing the meter rate | 5 working days | 3 working days | 2.3 | 95.6% | 1.5 | 97.3% |
| reactivation or takeover supply with changes to the meter rate | 10 working days | 6 working days | 2 | 100.0% | 1.0 | 100.0% |
| reactivation of supply following disconnection for late payment | 2 working days | 1 weekday | 0.7 | 92.6% | 0.8 | 98.1% |
| deactivation of supply | 7 working days | 3 working days | 3.1 | 95.7% | 2.1 | 95.9% |
| transfer of registration | 5 working days | 3 working days | 0.2 | 99.6% | 0.2 | 99.5% |
| estimates for works with inspection | 20 working days | 15 working days | 4.9 | 98.7% | 5.4 | 99.1% |
| completion of simple work | 10 working days | 6 working days | 13.4 | 77.8% | 4.2 | 90.0% |
| punctuality band for appointments | 180 minutes | 120 minutes | 0.7 | 99.0% | 0.8 | 99.2% |
| reply to complaints | 30 working days | 20 working days | 6.2 | 99.5% | 5.7 | 99.7% |
| reply to written enquiries | 30 working days | 20 working days | 5.6 | 99.8% | 5.4 | 99.6% |
| billing adjustment | 60 working days | 55 working days | 6.3 | 100.0% | 6.9 | 100.0% |

GENERAL LEVELS OF QUALITY

ACEA ATO 2 PERFORMANCE

| | | | 2020 | | 2021 | |
|---|--|--|------|--------|------|-------|
| completion of complex water connection | 90% of the services within 30 working days | 90% of the services within 20 working days | 27.6 | 84.6% | 8.2 | 96.7% |
| completion of complex sewage connection | 90% of the services within 30 working days | 90% of the services within 25 working days | 1 | 100.0% | 16.2 | 93.9% |
| completion of complex works | 90% of the services within 30 working days | 90% of the services within 20 working days | 43.1 | 76.2% | 14.8 | 91.8% |
| maximum time for the agreed appointment | 90% of the services within 7 working days | 90% of the services within 5 working days | 2.5 | 95.2% | 2.8 | 92.7% |
| arrival at the location of the emergency call | 90% of the services within 3 minutes from the telephone conversation with the operator | 90% of the services within 2 minutes from the telephone conversation with the operator | 2.6 | 97.9% | 1.3 | 97.7% |
| reply to written billing adjustment requests | 95% of the services within 30 working days from receipt of the request | 95% of the services within 20 working days from receipt of the request | 6.9 | 99.7% | 6.0 | 99.6% |
| reply to the emergency call (CPI) | 90% of the services within 120 seconds | 90% of the services within 110 seconds | 55 | 96.2% | 55 | 96.8% |

NOTE: the 2021 data are being consolidated and have still not been submitted to the STO or reported to ARERA. The symbol “/” is used when there are no services during the year.

Table no. 29 – The main specific and general levels of contractual quality in the water sector (2020-2021) – Acea Ato 5 – (ARERA parameters, improvement standards from the Service Charter, and Acea Ato 5 performance – 2020 figures are consolidated, 2021 figures are not consolidated)

ACEA ATO 5 - CONTRACTUAL WATER QUALITY SEGMENT

SPECIFIC LEVELS OF QUALITY

| SERVICES | ARERA STANDARDS | ACEA ATO 5 IMPROVEMENT STANDARD (from SC) | average actual completion time for services | degree of compliance | ACEA ATO 5 PERFORMANCE | |
|--|-----------------|---|---|----------------------|------------------------|--------|
| | | | | | 2020 | 2021 |
| estimate for water connection with inspection | 20 working days | 10 working days | 10.8 | 72.5% | 3.6 | 98.0% |
| estimate for sewage connection with inspection | 20 working days | 10 working days | 18.3 | 94.5% | 7.9 | 94.1% |
| execution of the water connection with simple work | 15 working days | | 3.1 | 100.0% | 1.9 | 99.3% |
| execution of the sewage connection simple work | 20 working days | | - | - | - | - |
| supply activation | 5 working days | | 11.2 | 55.5% | 2.9 | 97.4% |
| reactivation or takeover of the supply without changing the meter rate | 5 working days | | 5.2 | 73.3% | 1.4 | 98.9% |
| reactivation or takeover supply with changes to the meter rate (*) | 10 working days | | N.A. | N.A. | 0.0 | 100% |
| reactivation of supply following disconnection for late payment | 2 working days | | 1.0 | 99.5% | 0.9 | 97.3% |
| deactivation of supply | 7 working days | 5 working days | 6.7 | 77.4% | 2.1 | 99.4% |
| transfer of registration | 5 working days | | 0.4 | 99.6% | 0.1 | 99.7% |
| estimates for works with inspection | 20 working days | | 10.2 | 80.0% | 3.3 | 99.3% |
| completion of simple work | 10 working days | | - | - | 2.0 | 100.0% |
| punctuality band for appointments | 180 minutes | | 1.5 | 99.7% | 0.8 | 99.7% |
| reply to complaints | 30 working days | 20 working days | 13.0 | 94.7% | 10.0 | 98.7% |
| reply to written enquiries | 30 working days | 10 working days | 11.4 | 97.0% | 7.9 | 99.9% |
| billing adjustment | 60 working days | | 9.0 | 95.0% | 6.5 | 100.0% |

GENERAL LEVELS OF QUALITY

| | | | ACEA ATO 5 PERFORMANCE | | | |
|---|--|---|------------------------|-------|-------|-------|
| | | | 2020 | | 2021 | |
| completion of complex water connection | 90% of the services within 30 working days | 90% of the services within 20 working days | 9.4 | 91.3% | 12.6 | 90.4% |
| completion of complex sewage connection | 90% of the services within 30 working days | 90 of the services within 20 working days | 11.0 | 75.0% | 21.5 | 66.7% |
| completion of complex works | 90% of the services within 30 working days | | 11.9 | 95.6% | 11.8 | 85.7% |
| maximum time for the agreed appointment | 90% of the services within 7 working days | | 5.8 | 76.3% | 1.9 | 99.8% |
| arrival at the location of the emergency call | 90% of the services within 3 minutes from the telephone conversation with the operator | 90% of the services within 70 minutes from the telephone conversation with the operator | 61.1 | 89.9% | 96.5 | 87.9% |
| reply to written billing adjustment requests | 95% of the services within 30 working days from receipt of the request | 95% of the services within 10 working days from receipt of the request | 18.3 | 74.5% | 8.8 | 98.5% |
| reply to the emergency call (CPI) | 90% of the services within 120 seconds | | 83.0 | 85.8% | 105.0 | 80.6% |

(*) In 2020 there were no services found that were the subject of a resolution.

NOTE: The symbol "-" indicates that the average time cannot be calculated because the service is on/off.

Table no. 30 – The main specific and general levels of contractual quality in the water sector (2020-2021) – GORI (ARERA parameters and GORI performance - 2020 figures are consolidated, 2021 figures are not consolidated)

CONTRACTUAL QUALITY WATER SECTOR- GORI

SPECIFIC LEVELS OF QUALITY

| SERVICES | ARERA STANDARDS | average actual completion time for services | degree of compliance | average actual completion time for services | degree of compliance |
|--|-----------------|---|----------------------|---|----------------------|
| GORI PERFORMANCE | | | | | |
| | | 2020 | | 2021 | |
| estimate for water connection with inspection | 20 working days | 8.46 | 95.8% | 6.05 | 98.9% |
| estimate for sewage connection with inspection | 20 working days | 8.31 | 94.8% | 36.47 | 98.2% |
| execution of the water connection with simple work | 15 working days | 24.5 | 77.8% | 15.13 | 81.2% |
| execution of the sewage connection with simple work | 20 working days | - | - | 8.57 | 100.0% |
| supply activation | 5 working days | 13.14 | 84.5% | 4.76 | 93.4% |
| reactivation or takeover of the supply without changing the meter rate | 5 working days | 2.57 | 92.7% | 1.94 | 97.3% |
| reactivation or takeover of the supply with changes to the meter rate | 10 working days | / | / | / | / |
| reactivation of supply following disconnection for late payment | 2 working days | 0.7 | 95.3% | 2.55 | 97.4% |
| deactivation of supply | 7 working days | 4.17 | 92.2% | 3.71 | 98.6% |
| transfer of registration | 5 working days | 0.87 | 97.2% | 0.5 | 99.1% |
| estimates for works with inspection | 20 working days | 7.71 | 96.7% | 5.48 | 99.4% |
| completion of simple work | 10 working days | 11.53 | 74.4% | 17.23 | 62.5% |
| punctuality band for appointments | 180 minutes | 1.29 | 98.9% | 0.91 | 99.1% |
| reply to complaints | 30 working days | 11.72 | 91.5% | 13.9 | 85.8% |
| reply to written enquiries | 30 working days | 4.32 | 99.7% | 6.5 | 95.9% |
| billing adjustment | 60 working days | 17.0 | 100.0% | 1.2 | 100.0% |

GENERAL LEVELS OF QUALITY

| | | GORI PERFORMANCE | | | |
|---|--|------------------|-------|-------|-------|
| | | 2020 | | 2021 | |
| completion of complex water connection | 90% of the services within 30 working days | 31.07 | 80.6% | 25.39 | 77.7% |
| completion of complex sewage connection | 90% of the services within 30 working days | 29.83 | 76.2% | 27.37 | 72.4% |
| completion of complex works | 90% of the services within 30 working days | 62.0 | 51.2% | 41.44 | 66.3% |
| maximum time for the agreed appointment | 90% of the services within 7 working days | 5.3 | 83.4% | 6.71 | 93.8% |
| arrival at the location of the emergency call | 90% of the services within 3 minutes from the telephone conversation with the operator | 1.44 | 96.3% | 2.04 | 98.0% |
| reply to written billing adjustment requests | 95% of the services within 30 working days from receipt of the request | 5.87 | 97.5% | 9.5 | 95.2% |
| reply to the emergency call (CPI) | 90% of the services within 120 seconds | 64.82 | 93.5% | 52 | 97.4% |

NOTE: The symbol “/” is used when there are no services during the year.

Table no. 31 – The main specific and general levels of contractual quality in the water segment (2020-2021) – GESESA
(ARERA parameters, and Gesesa's performance - 2020 figures are consolidated, 2021 figures are not consolidated)

CONTRACTUAL QUALITY WATER SECTOR - GESESA**SPECIFIC LEVELS OF QUALITY**

| SERVICES | ARERA STANDARDS | GESESA PERFORMANCE | | | |
|--|-----------------|--------------------|--------|-------|--------|
| | | 2020 | | 2021 | |
| estimate for water connection with inspection | 20 working days | 3.86 | 97.1% | 5.14 | 71.3% |
| estimate for sewage connection with inspection | 20 working days | / | / | / | / |
| execution of the water connection with simple work | 15 working days | 21.25 | 85.2% | 4.17 | 94.4% |
| execution of the sewage connection with simple work | 20 working days | / | / | / | / |
| supply activation | 5 working days | 71.32 | 31.8% | 47.68 | 57.1% |
| reactivation or takeover of the supply without changing the meter rate | 5 working days | 2.05 | 97.5% | 3.70 | 80.4% |
| reactivation or takeover of the supply with changes to the meter rate | 10 working days | / | / | / | / |
| reactivation of supply following disconnection for late payment | 2 working days | 16.83 | 50.0% | 91.51 | 89.3% |
| deactivation of supply | 7 working days | 2.49 | 98.4% | 3.49 | 98.0% |
| transfer of registration | 5 working days | 0.63 | 99.0% | 0.9 | 98.9% |
| estimates for works with inspection | 20 working days | 3.46 | 97.4% | 3.84 | 96.4% |
| completion of simple work | 10 working days | 2.18 | 100.0% | 2.26 | 97.1% |
| punctuality band for appointments | 180 minutes | 57.00 | 97.8% | 3.0 | 95.4% |
| reply to complaints | 30 working days | 11.18 | 99.8% | 9.5 | 100.0% |
| reply to written enquiries | 30 working days | 10.21 | 99.5% | 8.8 | 100.0% |
| billing adjustment | 60 working days | 15.96 | 98.0% | 3.3 | 100.0% |

GENERAL LEVELS OF QUALITY

| | | GESESA PERFORMANCE | | | |
|---|--|--------------------|-------|-------|-------|
| | | 2020 | | 2021 | |
| completion of complex water connection | 90% of the services within 30 working days | 41.60 | 84.3% | 12.76 | 95.2 |
| completion of complex sewage connection | 90% of the services within 30 working days | / | / | / | / |
| completion of complex works | 90% of the services within 30 working days | 3.0 | 96.4% | 2.05 | 100% |
| maximum time for the agreed appointment | 90% of the services within 7 working days | 2.43 | 99.0% | 3.5 | 97.6% |
| arrival at the location of the emergency call | 90% of the services within 3 minutes from the telephone conversation with the operator | 10.00 | 62.2% | 28.21 | 72.8% |
| reply to written billing adjustment requests | 95% of the services within 30 working days from receipt of the request | 11.06 | 99.6% | 14.1 | 100% |
| reply to the emergency call (CPI) | 90% of the services within 120 seconds | 84.29 | 87.5% | 86.00 | 88.0% |

NOTE: The symbol “/” is used when there have been no services during the year, whereas “-” indicates that the average time cannot be calculated because the services is on/off.

Table no. 32 – The main specific and general levels of contractual quality in the water sector (2020-2021) – AdF – (ARERA parameters, improvement standards from the Service Charter, and AdF performance – 2020 figures are consolidated, 2021 figures are not consolidated)

CONTRACTUAL QUALITY WATER SECTOR- AdF

SPECIFIC LEVELS OF QUALITY

| SERVICES | ARERA STANDARDS | AdF IMPROVEMENT STANDARD (from SC) | AdF PERFORMANCE | | | |
|--|-----------------|------------------------------------|---|----------------------|---|----------------------|
| | | | 2020 | | 2021 | |
| | | | average actual completion time for services | degree of compliance | average actual completion time for services | degree of compliance |
| estimate for water connection with inspection | 20 working days | | 5.46 | 98.4% | 6.34 | 99.1% |
| estimate for sewage connection with inspection | 20 working days | | 5.93 | 97.9% | 6.50 | 98.9% |
| execution of the water connection with simple work | 15 working days | | 5.90 | 96.0% | 6.62 | 94.6% |
| execution of the sewage connection simple work | 20 working days | | N.A. | N.A. | N.A. | N.A. |
| supply activation | 5 working days | | 5.30 | 94.3% | 5.93 | 92.4% |
| reactivation or takeover of the supply without changing the meter rate | 5 working days | | 2.50 | 97.6% | 2.05 | 97.7% |
| reactivation or takeover supply with changes to the meter rate | 10 working days | | / | / | / | / |
| reactivation of supply following disconnection for late payment | 2 working days | | 0.71 | 97.6% | 0.85 | 97.8% |
| deactivation of supply | 7 working days | 5 working days | 2.32 | 99.1% | 2.68 | 98.2% |
| transfer of registration | 5 working days | | 0.1 | 99.9% | 0.2 | 99.9% |
| estimates for works with inspection | 20 working days | | 4.98 | 99.3% | 6.47 | 99.2% |
| completion of simple work | 10 working days | | 8.30 | 83.3% | 3.88 | 95.3% |
| punctuality band for appointments | 180 minutes | | 1.0 | 99.1% | 1.4 | 99.4% |
| reply to complaints | 30 working days | 25 working days | 13.3 | 98.9% | 15.4 | 99.5% |
| reply to written enquiries | 30 working days | 25 working days | 13.7 | 99.4% | 15.3 | 99.5% |
| billing adjustment | 60 working days | | 13.3 | 100.0% | 11.7 | 100.0% |

GENERAL LEVELS OF QUALITY

| | | AdF PERFORMANCE | | | |
|---|--|-----------------|--------|------|-------|
| | | 2020 | | 2021 | |
| completion of complex water connection | 90% of the services within 30 working days | 14.2 | 93.6% | 13.8 | 93.2% |
| completion of complex sewage connection | 90% of the services within 30 working days | 21.7 | 90.5% | 28.4 | 76.7% |
| completion of complex works | 90% of the services within 30 working days | 15.5 | 94.2% | 13.9 | 90.5% |
| maximum time for the agreed appointment | 90% of the services within 7 working days | 3.0 | 99.8% | 3.3 | 97.6% |
| arrival at the location of the emergency call | 90% of the services within 3 minutes from the telephone conversation with the operator | 6.0 | 95.1% | 1.5 | 94.7% |
| reply to written billing adjustment requests | 95% of the services within 30 working days from receipt of the request | 15.8 | 100.0% | 17.4 | 99.9% |
| reply to the emergency call (CPI) | 90% of the services within 120 seconds | 50 | 95.2% | 43 | 97.5% |

NOTE: The symbol “/” is used when there are no services during the year.

TARIFFS

ELECTRICITY SERVICE PRICING

In Italy, there are two main types of electricity markets: the standard market service and the free market. In the standard market service, the operator of reference of the territory, which operates in a monopoly regime, offers the supply service to the customer at economic and contractual conditions regulated by ARERA. On the other hand, in the free market the services offered and related prices are the result of competition among all operators. In this context, customers choose their supplier and the offer that most meets their requirements. The legislation has established the gradual abandonment of the standard market service, setting the dates by which the transition to the free market system will become definitive, the full entry into force of which is now set for January 2024.

The **costs** of supplying electricity are made up of **four items of expenditure**: “energy” (supply and retail marketing), **transport and meter management** (costs for delivery to customers and reading consumption), **system charges** (costs for activities in the general

interest of the electricity system, borne by all end customers) and **taxes** (consumption tax and VAT).

According to the latest ARERA data available, the number of customers still subscribing to the **standard market** service continues to fall and, in terms of **withdrawal points**, it accounts for a total of **43% of Italian domestic and non-domestic customers** (it was 47.7% the previous year).

The expansion of the **free market** is evident observing the volumes of electricity sold: free market customers, in fact, consume **84% of the total energy** intended for the end market⁷² (82.7% in the previous year).

For a “**standard**” consumption of the standard market - equal to **2,700 kWh/year**, with a power of 3 kW - the **estimated total annual expenditure** for electricity, updated to the fees defined by ARERA in the last quarter of the reference year and excluding taxes, was **€ 515** in 2021, an **increase** compared to the previous year (€ 44 per year).

72 Based on the number of served collection points and the volumes sold in 2020 (ARERA annual report September 2021).

Chart no. 30 – Electricity price trend for a standard domestic customer (€ cent/kWh) (2020-2021)

WATER SERVICE PRICING

By Resolution no. 580/2019/R/IDR of 27 December, the Energy, Networks and Environment Regulatory Authority (ARERA) approved the **Water Tariff Method (WTM-3) for the period 2020-2023**, the guiding principles of which are to overcome the *Water Service Divide*, making operating and management costs more efficient, promoting environmental sustainability and increasing the public's awareness of their water consumption habits. Moreover, the added tools and checks envisaged ensure that any **tariff increases are only possible as a result of investments actually made or certified improvements in management**.

Table no. 33 – Average water prices applied (2021)

| Company | €/m³ |
|------------|------|
| Acea Ato 2 | 1.86 |
| Acea Ato 5 | 2.69 |
| Gesesa | 1.65 |
| GORI | 2.39 |
| AdF | 3.89 |

CUSTOMER CARE



Acea Energia for sustainability: Electricity and gas offer **100% Eco** and **Acea e-mobility App**



The **“navigable” web bill** for the companies operating in the **water segment**



Acea Ato 2 opens the first **Waidy Points** in the territory



About **2,300 GWh** of **“green” energy** sold by **Acea Energia** to customers of the free market, + 92% compared to 2020



152 tonnes of **paper/year saved**, +44% compared to the 2020 figure, thanks to customers of the electricity and water services who have chosen **electronic billing**

THE CUSTOMER CARE POLICY

Attention to the customer is of fundamental importance to Acea, which intends to improve the “customer journey”, the experience customers have when they come into contact with the Group. The **operating companies** pursue this objective in their **daily relations**

with customers, while at the Parent Company the **Customer Listening Unit** ensures the monitoring and measurement of customer satisfaction with services, to support the companies with finding possible improvement actions. In 2021, customer satisfaction

surveys extended the scope of the survey to include brand awareness, usage and satisfaction with the **new digital channels** (see the section on *Perceived quality*).

In addition, the Customer Listening Unit, in conjunction with the operating companies and through an institute specialising in demographic research, carries out **mystery client surveys to check the quality of customer contact channels**: in 2021, alongside the usual surveys on **telephone and branch services**, Acea Energia's online chat channel was monitored and, on an experimental basis, GORI's video call service. The results are shared with Service Managers and contact operators and facilitate the identification of areas for improvement in each contact channel to take any necessary corrective measures.

Through the **unit ADR Body - Consumer Associations Coordination Unit** within the Parent Company, Acea monitors **how requests made by Consumer Associations are handled**. Although, due to the continuing COVID-19 health emergency, the Holding Company Unit was unable to hold face-to-face meetings, it **organised online meetings** with the main Consumer Associations to gather requests from local communities and continued to raise awareness for the use of **exclusively dedicated** digital and telephone channels, **implemented and managed by the Companies to respond adequately to the new needs emerged since the beginning of the pandemic**.

The **Consumer Associations** recognised by the National Consumer and User Council (CNCU) also support and represent customers who intend to resort to a **joint settlement procedure** for the out-of-court settlement of **commercial disputes**, used by Acea for

several years. Following the **Memorandum of Understanding for ADR** (Alternative Dispute Resolution) conciliation signed by **19 consumer associations** and the main Group companies⁷³, the **ADR body**⁷⁴ was set up, which allows customers of Acea Energia, Areti, Acea Ato 2, Acea Ato 5 and Gesesa to access **out-of-court dispute resolution through the ADR procedure**. In order to provide a better service, a pilot phase of surveys to measure customer satisfaction with these services was launched in 2021. During the year, the Body received a total of **345 requests for procedures - 222 for the water sector and 123 for the energy sector** -, a **figure that was down by 17.7%** compared to the previous year (419 requests in 2020); of these, in accordance with the law and the Regulation, 237 were assessed as proceeding and 108 as not proceeding.

GORI, which has long signed a **Memorandum of Understanding** for the conciliation of disputes with local consumer associations, also handled **122 conciliation requests** in 2021 and concluded **385 ARERA conciliation requests**.

AdF has a relationship of constant collaboration and comparison with the Consumer Associations active in the territory. In 2021, **meetings were organised with the representatives of the local Associations on an IT platform to present and share the major regulatory changes**, including the closure of the tariff reform envisaged by the Integrated Water Service Fees Text (TICSII), the entry into force of the new Integrated Water Service Charter, the new Conciliation body activated by the Tuscany Water Authority.

The **judicial disputes that took place during the year** between Acea and the customers is explained in the dedicated box.

DISPUTES WITH CUSTOMERS 2021

Legal proceedings **brought by customers** against companies of the Acea Group mainly concerned disputes relating to **charges for service supply, adjustments, pricing structures and service activation delays**. There were **612** such disputes in **2021**, broadly **in line** with the 2020 figure (576 disputes started in the year). As at **31 December 2021**, the **total number of disputes pending**

with customers (including disputes initiated in previous years) **amounted to 1985**, down slightly with respect to the previous year (2,181). The situation is affected by the general slowdown in services, including judicial services, resulting from the health emergency. This type of litigation is the one that can be resolved most quickly and with a less costly procedure.

Acea Energia has defined and applies **specific procedures**, depending on the channel used, to combat "**disputed activations/contracts**" and "**unsolicited supplies**"⁷⁵.

For **customers of the free market**, in the event of a contract proposal signed using **door-to-door sales or by telephone**, the Company carries out procedures to **verify the correct behaviour of the sales operator**, the clear presentation of the content of the contract signed, and, above all, the customer's awareness of having made a choice by means of a confirmation call aimed at limiting the risk of misunderstanding and belated exercise of the right of withdrawal. Acea Energia **checks the completeness and absence of alterations of all printed contracts and listens to all the telephone records produced by the sales reps**. In the event of issues being detected, the IT systems prevent continuation of activation of the offer. The **digital sales channel** currently in use at the physical channel

shop in shop envisages elements, such as signing the contract with a biometric signature using a **tablet and an app**, the digital acquisition of pre-contractual and contractual documents and their transmission to the Company's back-end systems, **aimed at eliminating the risk of errors and/or tampering**.

A new digital sales process has been implemented with electronic signature based on a **one-time password (OTP) for the telemarketing channel**, and on an experimental basis, for physical networks. The customer contacted, who has expressed interest in receiving a contract proposal, **can receive in advance**, at his/her e-mail address, **all the pre-contractual and contractual material in digital format** and proceed only later, if desired, with the digital signature of the contract, by entering the OTP received via SMS on the mobile phone number indicated.

⁷³ The Protocol was signed in 2016 between the Associations and the companies Acea Energia, Areti, Acea Ato 2 and Acea Ato 5; since December 2020, Gesesa has also joined the ADR body. Three other Group companies active in the water sector, not included in the scope of the NFS, are signatories of the Protocol, and have received a total of 22 requests for ADR procedures, 13 of which are considered eligible.

⁷⁴ Since February 2017 the ADR Body has been included by resolution in the list maintained by the Authority.

⁷⁵ In compliance with ARERA resolution 228/17 and Article 66 quinquies of the Consumer Code.

Signing of the contract by digital signature is the only method envisaged for acceptance of the proposal and this **reduces the risk of persuasive phenomena** induced by the sales network.

With the **2021 Agency Mandates** Acea Energia introduced a specific annex ("Penalties") **to regulate the sanctioning process** of the Agencies, providing for a broader and more articulated range of violations. As part of the agency mandate that governs the relationship with the network of sales agents, Acea Energia verifies performance. In 2021, it **analysed 926 contract proposals, which were the subject of complaints** for "disputed activations/contracts" or "unsolicited supplies" or other violations provided for in the "Penalties" annex to the mandate. As a result of the verification activities, intensified in the year, **567 cases of "unfair commercial practices"**, nearly 61% of the cases analysed, **were reported** to the Agencies. As is customary, Acea Energia carried out a **mandatory training programme for sales representatives** (see the Suppliers chapter) and maintained, in the aforementioned agreements, **bonus/malus mechanisms related to the quality of the contracts** acquired.

Acea Energia has undertaken important initiatives aimed at improving the digital channels available to customers and **a commercial and communication strategy** that has had **sustainability as one of its pillars**, introducing new offers and value-added services. In

particular, **a catalogue of 100% Eco-sustainable electricity and gas offers was launched** and **a brand shared** with a telephone company: **WindTre Luce&Gas Powered by Acea Energia was created**.

With the new brand, highly innovative for its configuration, Acea Energia introduces a **model of collaboration** aimed at enhancing the commercial potential of the WindTre brand and the strength of Acea Energia in the management of the Light & Gas service, with the aim of proposing to customers an offer marked by transparency, reliability and proximity, thanks to the strengthening of sales channels available. The partnership, launched during the year, will come into full effect in 2022.

A major communication campaign, carried out on digital platform, press and billboards, was dedicated to **promoting Acea Energia's entry into the world of electric mobility** (see the dedicated box) and a second communication campaign, with testimonials, carried out through press, digital, social, TV and outdoor, aimed at **promoting the company's sustainable mission**, engaging and raising customer awareness **with the launch of the 100% Eco offers** mentioned above (see the box dedicated to commercial offers and the paragraph Communication, events and solidarity); the campaign was reinforced by a **competition** open to all customers - "a win that will make ECO" - with electric cars up for grabs.

ACEA ENERGIA LAUNCHES THE NEW APP: ACEA E-MOBILITY

In 2021 Acea Energia entered the world of services dedicated to sustainable mobility, contributing to the spread of a new culture of mobility and developing a technological solution that has allowed the development of an App dedicated to the optimal use of electric charging stations.

The **Acea e-mobility** App is characterised by a number of strengths:

- **widespread presence**, with more than 10,000 easily identifiable recharging points around the country;
- the **free booking service**, as a promotion of the year for customers;

- digitalisation: **top-up and payment via Card or App**;
- **assistance 24 hours a day and 7 days a week** for using the app and for information on prices, payment methods, invoices and problems with the recharging service or the charging stations.

Using the App, customers can geolocate the nearest charging station, book it and recharge their car in a smart way. The offer is based on two different tariffs, depending on the type of charging station, for quick or fast recharges.

Communications were also carried out in the press to further spread awareness of the Acea Energia brand and digital campaigns to promote the **"digital consultant"** service and the **"boiler"** product, which benefited from the tax bonus for the customer (see box on commercial proposals). Particular attention was paid to the acquisition of **"multi-site customers"** in various industries, from banking to services to ensure a **multi-year customer base** and initiatives were launched to offer **value-added services** to employees of this type of customer, proposing "welfare" commercial offers for the supply of electricity and gas.

In 2021, with **a leap forward** compared to the growth trend already seen in recent years, the **"green" energy sold**⁷⁶ by Acea to free market customers (estimated at 2,300 GWh) **increased by 92%** compared to the consolidated volumes of 2020 (equal to 1,198 GWh). The **share** of this item out of the **total energy sold** in the year to free market customers (about 6,075 GWh, see also Environmental Accounts) **reached 38%**. In addition to the launch of new offers, the increase in the estimated amount of "green" energy sold was also due to the activation of contracts previously stipulated in the industrial sector, with effect from January 2021.

⁷⁶ Like the 2020 figure, the figure for G.O. certified green energy sold in 2021 by Acea Energia and AEMA also includes the main Group companies' internal consumption, which contributes approximately 420 GWh out of an estimated total of 2,300 GWh. The final calculation is expected in March 2022, and the consolidated data will be updated in the next reporting cycle.

ACEA ENERGIA'S 2021 COMMERCIAL PROPOSALS FOR THE FREE MARKET: 100% ECO AND NEW SERVICES

In 2021 Acea Energia introduced **important new features** in its commercial offer, such as 100% Eco light and gas and value-added products such as boilers, air conditioners and wall-boxes.

Acea Energia's **sustainable offers** include **100% Green Light** and **0% CO₂ Gas**, in line with the Acea Group's objectives of environmental protection and commitment to the territory.

Electricity has a "Guarantee of Origin" electronic certification that **attests to the renewable origin of the sources used for its production**. Gas **offsets the carbon dioxide emissions** produced by consumption through the **purchase of certified carbon credits** (VER - Verified Emission Reduction), which help to fund and support **mitigation projects** (Verified Carbon Standard) in Peru and India with concrete benefits for local communities.

The structure of the offer portfolio maintained maximum **flexibility towards customer needs**, with indexed offers (e.g. wholesale price), fixed price offers and exclusive offers for the web channel.

Finally, in compliance with the provisions of ARERA, in its product

catalogue Acea Energia has prepared the differentiated **PLACET** offers – Free Price at Equivalent Protected Conditions – for families (domestic use) or small businesses (non-domestic use).

During the year, sales of so-called 'VAS' (value added services) were consolidated, such as **high energy efficiency boilers and air conditioners**, to reduce consumption, with a view to sustainability. With the purchase or replacement of obsolete equipment with that offered by Acea Energia, **the customer can take advantage of the transfer of credit** in accordance with current regulations. The offer proposed by Acea Energia consists, in addition to the physical asset, of services such as consulting, installation and assistance, aimed at ensuring a **"turnkey" solution**.

The year 2021, with the new app **Acea e-mobility**, marked the entry of Acea Energia also in the electric mobility market, to invest in the spread of the culture of sustainable mobility supported by smart technology.

The **"Acea con Te" loyalty program**, for domestic customers on the free market, recorded a **66% increase in registered customers** in 2021 compared to 2020, confirming the upward trend. During the year, the limitations of activities caused by the health emergency did not allow tickets to events to be given away; however the **Emozioni da Prima Fila** [Front Row Excitement] competition continued throughout, by proposing a new format of remote events. Acea Energia has continued this activity, the heart of the programme, by offering prizes to registered customers in the home, kitchen, children, hi-tech, personal and voucher categories. Also significant was the launch of the **partnership with Gambero Rosso**: a co-marketing agreement to convey a **sustainable food and wine culture** to those enrolled in the programme. Subscribers can take advantage of ad hoc events on the Gambero Rosso Academy training platform, as well as specific awards and formats in the wine, travel and food sectors.

Water companies have also stepped up communication initiatives aimed at customers. In line with the **innovation and digitalisation strategy** pursued at Group level, **Acea Ato 2** carried out communication and awareness-raising campaigns to promote the new digital services, which continued on several occasions during the year, using the main media channels (press, web, radio commercials). In January 2021, the campaign on the new **digital branch** service was launched, allowing transactions traditionally handled at physical branches to be carried out from home via video call. Some of the most important municipalities in the ATO 2-Central Lazio area have contributed to publicising the new service on their institutional and social channels. To promote the MyAcea customer area, enriched with new features, a campaign was launched in July 2021 in the press, outdoor, digital and radio, dedicated in particular to the new web bill. Finally, a press, digital and outdoor campaign was car-

ried out – particularly in the province – to inform customers about the opportunity provided by the **water bonus**, dedicated to families in economic difficulty, which allows them to save up to 100% on their annual water bill. The claim **"we value your needs more"** and simple and direct language were chosen to instil confidence, and so encourage potential beneficiaries to apply for the bonus.

In 2021 **Acea Ato 5** continued the project undertaken in 2020 aimed at making customers aware of specific issues, such as communicating meter readings and mitigating the risk of meters freezing, and informing them about the planned replacement of the meters. In addition, the "Water Identity Card" project continues to be implemented, allowing users to provide their residential address in order to have access to data and information on the quality of the water supplied, including an indication of the values of the main analytical principles that characterise the water in the area of interest. The document is available both digitally and in a printable version.

In 2021, **AdF** created the communication campaign **"We value your choices"**, to promote the **loyalty bonus**, a one-off incentive for the most virtuous users who have activated both the web bill and bank or post office direct debits for more than twelve months. In this way, AdF wanted to highlight the choices made by customers in terms of **sustainability**, for the paper savings resulting from activating the web bill and for the relationship of trust with the Company with the activation of the direct debit system. In addition, in 2021, AdF allocated a Solidarity Fund to SME users (see dedicated box).

In 2021, **GORI** proposed campaigns aimed at customers, for example on the correct protection of meters and systems from frost or on the quality of water distributed, transmitting them on various channels and using videos and other media for the web and the press.

ADF ALLOCATES A SOLIDARITY FUND TO SME USERS

In the last quarter of 2020, following the wishes expressed by its members, **AdF set up a call for tenders for a Solidarity Fund** to support **local businesses** affected by the lockdown due to the health emergency, which nevertheless **continued to consume water** to keep running efficiently and recorded losses of no less than 20% with respect to turnover in the corresponding period of the previous year. After AdF had sent precise communications, even through Trade Associations, to explain the prerequisites for access to the fund, **179 applications were processed**, from 37 municipalities out

of 55 in the managed territory, **96 of which met the necessary requirements** to benefit from the fund. Therefore, in 2021, **AdF disbursed about € 40,000** and allocated the remaining availability of the fund, equal to **about € 260,000, to the amortisation of the fixed quotas (aqueduct) for artisan and commercial businesses**, equal to two monthly payments of the aforementioned quotas (2020 tariff) **in favour of 20,863 active artisan and commercial users and invoiced in 2020**.

CONTACT CHANNELS AND PERFORMANCE

In all customer relations, Acea is committed to **guaranteeing the respect of privacy in the management of personal data**. In particular, Acea keeps updated safeguards on the issue of privacy to better respond to the evolution of the relevant legislation, in line with the European regulations (General Data Protection Regulation - **GDPR**)⁷⁷ on the protection of personal data (see in-depth analysis in *Corporate Identity*, The Internal Control and Risk Management System).

In addition to **traditional contact channels** (call centre and branches), Acea makes available to customers **digital contact channels** that are more advanced every year. The health emergency situation, which was triggered in 2020 and will continue in part in 2021, has in fact made it essential to spread the use of remote channels, spurring companies to continually improve them. During the year, therefore, all Group companies managing customer relations implemented initiatives aimed at improving remote contact channels and increasing the digitalisation of commercial processes.

The **MyAcea self-care platform**, also available in the form of an **App** for mobile devices, allows customers to **manage all their water, electricity and gas needs with a single account, facilitating the user experience** and at the same time **expanding the range of actions available**, such as the new graphic design which makes it more user-friendly and intuitive, the possibility of booking appointments at physical and digital branches, and the digital drawer which allows them to view contractual documents and payment reminders. The companies in charge of the different services ensure the processing required.

The **MyAcea web area** recorded approximately 10,000 log ins (cumulating those for the water service and the free energy market) with **452,126 unique users connected in 2021**; while the Rome Electricity Service customer area, for the standard market service, had approximately 3,800 daily log ins with **33,943 unique users connected**.

The **MyAcea app**, installed by about **361,000 people**, saw further growth of the user base, with **an increase of 24.5% in 2021** compared to the previous year (roughly 290,000 people in 2020).

In 2021 Acea Energia implemented new features on the portal for “large customers” to access information about supplies, payments, contracts, invoices and consumption data. In particular, a feature has been introduced to allow customers to access energy market data, while bulk uploading of technical and commercial services will be available in 2022.

Among the customers of Acea Energia, **the MyAcea App was installed on 207,962 devices** (Android and iOS) in 2021 while **the App dedicated to the standard market**, Rome Electricity Service,

was installed on **37,679 devices** (Android and iOS) in the year.

An important process was begun by **Acea Ato 2** to modernise and digitalise the experience customers have when using the services. Among the main initiatives undertaken:

- the development of the **digital branch**, the service that can be used, upon reservation, via computer equipped with a webcam or via smartphone. With a view to overcoming the digital divide, the Company has also made available, by appointment, access to **local branches**, known as “**Waidy Points**” (see the dedicated box below);
- the **development of an integrated customer relationship management platform, Salesforce**, with an omnichannel perspective; the project launched in 2021 will be completed in the following two years; the platform also includes the development of a tool (SalesForce dunning) aimed at streamlining the solicitation process in the event of credit recovery.
- digitisation of two important commercial processes (transfer and takeover), to make them digitally usable with the possibility of finalising the contract by accepting a link received by email;
- the development of the **new CTI Genesys telephony platform** and the consequent transfer of the contact centre service; the process started in March 2021 with the definition of the requirements of the new platform and is currently being implemented and tested. The tools accompanying the new platform will enable a better customer experience and simplify contact centre operations.

At 31/12/2021, there were **345,335 users registered in the MyAcea customer area pertaining to Acea Ato 2**, an increase of around **12%** (307,885 in 2020). This figure corresponds to 49% of the customers with active water supplies at 31/12/2021 (705,607).

Acea Ato 5 has renewed its commitment to implementing more effective customer management systems and improving communication; the **digital branch**, the system of video calls on appointment and assistance from an operator, was activated at the end of 2020, flanking the other remote channels, such as toll-free numbers, the MyAcea app, e-mail and the web portal. In 2021, the company also carried out information campaigns, both in the press and via email and text messages, to promote the **use of remote contact channels** (toll-free number, dedicated numbers, MyAcea platform and app, website and email) and the **new interactive bill**. **Subscriptions to the relevant My Acea area** increased to a total of **56,623 users**, **29% more** than the 2020 figure (43,829 users), accounting for around 28% of total active contracts in the year.

⁷⁷ Regulation EU 679/2016 (GDPR).

AdF continued to promote the use of the MyFiora customer area through its 2021 advertising campaign “**Simple and fast? MyFiora**”, conducted in traditional and digital media. This contributed to an increase in the number of registered customers to **52,847, up 25.4%** on the 2020 figure (42,144 registered). The customer area has also been enriched with new features, thanks to the release of the “**Digital Hub**”, which allows users to have a quick and immediate overview of the most relevant news about the services available. In order to expand its digital service offering, AdF has activated, as of February 2021, a **chat** facility, through which, at set times, customers can receive assistance and support in real time. The tool, which is still in the **experimental phase**, is very much appreciated by users, who gave an average rating of **96/100** out of the total number of interactions recorded. Lastly, **social media** are increasingly used by clients to interact with AdF; the **community management** service, developed both in terms of the editorial plan and the moderation of requests, has been constant and regular, in order to increase user engagement. The Company has also invested in the development of the telephone channel, reinforcing the **digitalisation of commercial processes**, adding “takeover” to “transfers”; this development has contributed to reducing processing times and optimising call centre performance. Finally, AdF has activated an **advance warning service**, with notifications sent by e-mail and text message to **all customers** affected by **planned interruptions of supply** over the next 24 hours.

GORI once again carried out communication activities aimed at increasing adherence to digital services (MyGORI and web billing, **including the new interactive bill**), and recorded an **increase of around 35%** in the number of registered users of the **MyGORI** reserved area during the year, compared to the figure for the previous year (119,370 registered customers), reaching **160,843 registered users** as at 31 December 2021. **Gesesa** has repeated in 2021 the information campaigns on toll-free numbers, through social media and traditional media (outdoor) and the two campaigns on how to submit the meter reading and on the online area MyGesesa. As at 31/12/2021, the **MyGesesa reserved area** reached **9,009 registered users** (it was 7,400 in 2020).

On the website **www.acea.it** dedicated to the **free market** and on the website **www.servizioelettricoloroma.it** dedicated to the **protected market of Acea Energia** there are **guides to reading the bill**. Guides for reading bills are also available for customers of the **water service**, found in the **Water section** of the Acea Group website **www.gruppo.aceait**.

In 2021, the **project for restyling and revising the bills of all the water companies in the Acea Group was completed**, which included the introduction of a renewed graphic layout, the simplification and rationalisation of the content, the new e-mail template for the delivery of the web bill, designed to convey to users the image of a company that is digitally ready and attentive to sustainability issues. The **new interactive bill** has also been introduced, which complements the web bill in PDF format, **designed as a navigable dashboard available to the customer**. The service was released in January 2021 on a pilot of 7,000 Acea Ato 2 households, and **during the year it was made available to users** with the web billing service of the Group companies operating in the water sector.

The electronic invoice, in the new interactive configuration usable via PC, smartphone and tablet, is rich in new content, showing the main information elements on the home page (water user data, billing period, actual billed consumption, amount to be paid, payment status), allowing the customer to easily and immediately understand the dynamics of their consumption and related expenditure.

To illustrate the digitalisation process undertaken, Acea Ato 2, as already mentioned, launched an advertising campaign in 2021, present on the main web and print media, a storytelling campaign based on three themes: digital branch, MyAcea and electronic invoice. At **31/12/2021**, the number of **Acea Ato 2 users with electronic invoicing** was **358,707** (about **55% more** than the figure of 230,049 users with web billing in 2020), corresponding to 52.5% of active users in the year; thanks to electronic invoicing, the **paper saved** by the company **in the year** amounted to **63.6 tonnes**⁷⁸.

AdF has regularly promoted the activation of the web bill, including the new interactive bill, and digital payments through targeted communication campaigns in traditional and digital media. At the end of 2021, the total number of users with an active **web bill** was **83,277**, about **36% of total users**, an increase of **8.5%** compared to the previous year (76,759 users), with a **paper saved in 2021** amounting to **9.9 tonnes**.

In 2021, **GORI** launched campaigns aimed at activating the web bill and promoting the new interactive bill, thanks to which **subscriptions to the service reached 197,790 (+72.7%** compared to 114,469 users with a web bill in 2020), saving **17 tonnes of paper per year**.

Acea Ato 5 has promoted the use of digital channels and the activation of the new interactive bill, emphasising its combination with, among other advantages, the regularity of receipt of the invoice. The communication campaign was launched in the Acea Ato 5 territory in July 2021 and consisted of 10 appearances in the press, over 10 million impressions on digital media and was aired 1,500 times on the radio. As of 31/12/2021, there were **47,623** customers using the web billing service (**37.4% more** than the 34,654 customers in 2020); this generated a saving of **5.7 tonnes of paper per year**.

Gesesa has continued to raise awareness of the web billing service through direct telephone contact with users; as of 31 December 2021, there were **8,206** users with the service active (**+6.7%** compared to 7,690 users in 2020), **saving 1.4 tonnes of paper per year**. Thanks to the awareness and communication initiatives implemented by **Acea Energia**, at 31/12/2021, there were **394,655 active supplies with the web billing option** (in detail, 226,941 for the free market and 167,714 for the standard market service), **an increase of 14.4%** compared with the 2020 figure (344,946 supplies with web billing). In terms of environmental protection, this equates to a **saving of paper of 54.4 tonnes/year**.

Overall, therefore, thanks to the **web billing service offered by Group companies and the customers who activated it**, **152 tonnes of paper were saved in the year**, **44% more than the 2020 figure** (105.5 tonnes of paper).

Acea Ato 2 has **internalised**, since July 2020, the **management of the contract with the external supplier of the contact centre service**. The service is carried out according to the One Call Solution (OCS) approach, in order to meet the needs expressed by customers through a single contact.

78 The figure shows a significant increase, also as a result of the change in billing frequency for some users (from quarterly to bimonthly).

The quality of the telephone service is monitored and the **contact staff is trained and attend seminars** on procedure and how to interact with the customer. Acea Ato 2, moreover, **through the external supplier**, manages the **chat service** to support customers who surf the website and, after registering, use the services available in the MyAcea customer area. In **Acea Ato 5**, the contact centre service was provided as a service by Acea Ato 2, with the collaboration of the external supplier, until June 2021; from the following month, the management of the contact centre was internalised by Acea Ato 5, with the aim of directly monitoring the specific needs of the area, and the external supplier was used for some remote channels for commercial use. The Company then prepared a public tender for the award of the contact centre service, with a One Call Solution perspective, to a new supplier, which will start operating in the first months of 2022.

Acea Energia internally manages the **social media channel** (Facebook) for free market customers and the dedicated **chat channel**, while for the standard market service (Rome Electricity Service) the chat channel is managed by the external supplier; it also manages the toll-free numbers for the free market and the standard market service, outbound campaigns, back office customer care activities, the toll-free number for making appointments at the branch, the Padius toll-free number and the Premium toll-free number.

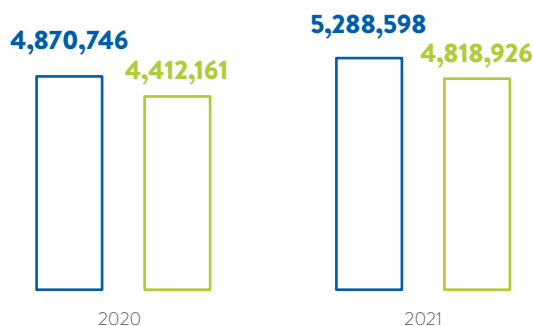
In 2021, the new customer management application (CRM), based on the Salesforce platform, went into production; this milestone enabled Acea Energia to optimise operations with a positive impact on the performance of contact channels.

In 2021, **the Group's toll-free numbers received more than 5.2 million calls, an increase of 8.6%** compared to 2020 (approximately 4.8 million calls); the figure, which has been on an upward trend over the last two years, is consistent with the greater use of remote contact channels (toll-free numbers, apps, web, digital branches), highlighted in relation to both restrictions on access to branches and a progressive greater familiarity of customers with digital channels.

The **overall service level**, despite the increase in the number of calls received in the year under review, was 91%, in line with the performance recorded in 2020 (see Chart 31 and Tables 34 and 35 for the performance of individual companies, at the end of this section).

Acea Energia provides customers with the **Padius App** (free of charge and available for all devices), through which **people with hearing impairment** can contact the call centre - on a telephone line with a dedicated priority queue - by writing text messages in chat, which are read to the operator by a computerised voice, while the operator's answers are returned to users in written form.

Chart no. 31 – Total telephone traffic of Acea toll-free numbers (2020-2021)

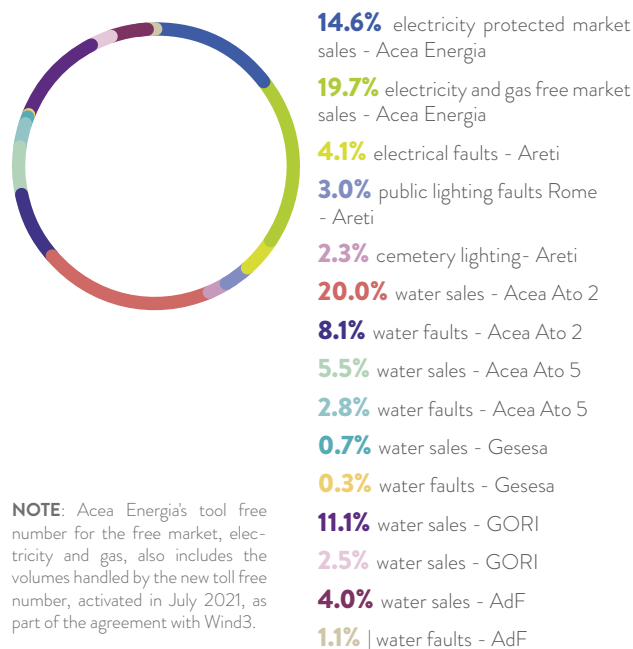


responses/received
2020: **91%**
2021: **91%**

■ no. of calls received
■ no. of responses

NOTE: the 2020 figures have been slightly adjusted to consolidate Acquedotto del Fiora's data; the 2021 figures include Acea Energia's new commercial toll-free number, activated in July following the agreement with Windtre.

Chart no. 32 – Percentage distribution of telephone traffic received by Acea toll-free numbers (2021)



NOTE: Acea Energia's toll free number for the free market, electricity and gas, also includes the volumes handled by the new toll free number, activated in July 2021, as part of the agreement with Windtre.

The opening of **physical branches** was organised to ensure **maximum safety for users and staff**, with **customers allowed entry by appointment only**, and this, together with the further development of remote channels, continued to result in **much lower number of visitors** than in pre-pandemic years.

The **branches at Acea's headquarters in Rome**, in Piazzale Ostiense, for the electricity, gas and water services managed by **Acea Energia** and **Acea Ato 2**, **allowed entry to a total of 50,254 customers** in 2021 (the figure for 2020 was 88,723 customers and that for 2019, before the pandemic emergency, 204,542 customers), with **service levels close to 100%**. In compliance with health safety measures, as already mentioned, branches allowed entry by appointment only.

If the total figures for **all companies in the perimeter** are con-

sidered, **121,674** customers were allowed entry at the branches (163,527 customers allowed entry in 2020 and 555,496 in 2019). See Table nos. 34 and 35 for the performance over the last two years of the individual Companies.

The **digital branch**, activated in the last quarter of 2020 also for water companies, **consolidated its operations in 2021**. In particular, for **Acea Ato 2**, the digital branch has **established** itself as a contact channel able to offer the same services provided by the physical branch, **reaching an average of about 2,000 appointments per month**, which **exceeds the number of appointments managed at the physical branch** at headquarters. Acea Ato 2 has also activated the first **Waidy Points** in 2021 (see box with details).

ACEA ATO 2 OPENS WAIDY POINTS IN THE TERRITORY

With a view to overcoming the digital divide, Acea Ato 2 has made the digital branch service available at local branches known as "**Waidy Points**". These are **digital workstations** equipped with an **internet connection, touch screen** and all the necessary hardware tools to manage a video call appointment, to be booked by contacting the sales toll-free number, serving customers who do not have IT tools. Waidy Points have a '**digital facilitator**' to provide support during the connection phase, combining innovation with proximity

to customers who are less familiar with such channels.

The first six Waidy Points will be operational from May 2021 at the territorial branches of Tivoli, Frascati, Velletri and Subiaco, and new openings are planned in other municipalities of ATO 2.

Acea Ato 2 also guarantees for the Waidy Points compliance with the service levels provided by the Integrated Text for the regulation of the contractual quality of the Integrated Water Service (RQSII), applying the improvement standards defined by the Service Charter.

Also for AdF, access to the two AdF Points in Grosseto and Siena was allowed by appointment⁷⁹, which could be booked through the sales toll-free number, the website or directly at both locations. Customers were also able to use the **digital branch** by appointment, assisted by a commercial operator via **video call**. This new method of contact has helped to increasingly transform the interaction with the customer into **a moment of listening more attentively to specific needs**. The customer clustering process, which began at the end of 2020, has led to the definition of new professional figures specifically dedicated to the management of specific customer segments (Member Municipalities, Businesses, Condominiums, industrial waste) through confidential contact channels.

Gesesa has launched the campaign "**Gesesa for you**", to promote the new digital service "**Prenotami**" (Book me), with which customers can choose the day and time to access the branch by appointment. In 2021, the development of digital channels actually strengthened the ability of Group companies to remain close to their customers, and allow them to access services without the need to physically go to the branches.

Operating Companies also handle **written complaints, following the processing of cases using information systems: from reporting to resolution**.

For the **energy service**, the "replies to written complaints/enquiries" both by the sales Company and the distribution Company, are services included among the **levels of commercial quality** subject to regulation by the national Authority (see sub-paragraph Quality levels regulated by ARERA in the electricity sector). Likewise, for the **water service, the contractual quality levels**, specific and general, introduced by the Authority, also provide for management procedures and response times to enquiries, written complaints and requests for billing corrections (see sub-paragraph *Quality levels regulated by ARERA in the water sector*).

For the **public lighting service**, responses to **written complaints/enquiries** are handled directly by Areti. In 2021, a total of **3,704 complaints/enquiries** were received; this figure is slightly up on the 3,462 recorded in 2020; the company **replied to 93%** of them by 31 December.

⁷⁹ For the use of branches by appointment, the Authority has introduced an additional standard, linked to the maximum time of appointment at the branch. The maximum time for the agreed appointment at the branch is the time between the day on which the Operator receives the request for an appointment at one of its branches from the end user and the day on which the appointment is made available at that location.

Table no. 34 – Energy: performance of toll-free numbers and branches (2020-2021) (*)

| TOLL-FREE NUMBERS (*) | | | |
|---|--------------|-------------|-------------|
| | u. m. | 2020 | 2021 |
| COMMERCIAL TOLL-FREE NUMBER (Acea Energia) - STANDARD MARKET SERVICE | | | |
| total calls received | no. | 704,705 | 774,011 |
| total answers | no. | 669,300 | 740,472 |
| service level (% of answers to calls received) | % | 95.0% | 95.7% |
| average waiting time | min. sec. | 2'03" | 1'48" |
| average conversation time | min. sec. | 6'06" | 6'03" |
| COMMERCIAL TOLL-FREE NUMBER (Acea Energia) - FREE MARKET (energy and gas) (**) | | | |
| total calls received | no. | 874,990 | 1,042,053 |
| total answers | no. | 790,935 | 971,657 |
| service level (% of answers to calls received) | % | 90.4% | 93.2% |
| average waiting time | min. sec. | 1'36" | 1'22" |
| average conversation time | min. sec. | 7'18" | 7'13" |
| FAULT TOLL-FREE NUMBER (Areti) | | | |
| total calls received | no. | 202,639 | 214,186 |
| total answers | no. | 200,612 | 209,074 |
| service level (% of answers to calls received) | % | 99.0% | 97.6% |
| average waiting time | min. sec. | 0'51" | 1'46" |
| average conversation time | min. sec. | 3'08" | 3'37" |
| PUBLIC LIGHTING - FAULT TOLL-FREE NUMBER (Areti) | | | |
| total calls received | no. | 147,878 | 160,998 |
| total answers | no. | 146,399 | 156,758 |
| service level (% of answers to calls received) | % | 99.0% | 97.4% |
| average waiting time | min. sec. | 0'44" | 2'12" |
| average conversation time | min. sec. | 2'49" | 3'00" |
| CEMETERY LIGHTING - COMMERCIAL TOLL-FREE NUMBER/FAULTS (Areti) | | | |
| total calls received | no. | 96,183 | 121,817 |
| total answers | no. | 89,874 | 120,013 |
| service level (% of answers to calls received) | % | 93.4% | 98.5% |
| average waiting time | min. sec. | 0'49" | 8'03" |
| average conversation time | min. sec. | 4'34" | 4'34" |
| BRANCHES (***) | | | |
| ACEA ENERGIA - STANDARD MARKET SERVICE BRANCH | | | |
| tickets issued | no. | 34,258 | 13,594 |
| customers served | no. | 32,369 | 13,562 |
| service level (% customers served/tickets issued) | % | 94.5% | 99.8% |
| average waiting time | min. sec. | 8'40" | 3'17" |
| average service time | min. sec. | 11'34" | 7'07" |
| ACEA ENERGIA - FREE MARKET BRANCH (energy, gas and offers) | | | |
| tickets issued | no. | 32,880 | 19,262 |
| customers served | no. | 32,250 | 19,234 |
| service level (% customers served/tickets issued) | % | 98.1% | 99.9% |
| average waiting time | min. sec. | 4'46" | 4'13" |
| average service time | min. sec. | 11'44" | 8'49" |

(*) The volumes of channels subject to sector regulation are consistent with the calculation methods envisaged for reporting to ARERA. For example, for the toll-free numbers of Acea Energia and Areti, the average waiting time is the time that passes between answering, even if it is made through an automatic answering machine, and the beginning of the conversation with the operator or the end of the call if the caller hangs up before the beginning of the conversation with the operator.

(**) Includes data from the "WindTre Luce and Gas powered by Acea Energia" partnership service, active from 12 July 2021.

(***) Figures of branches were highly influenced in 2020 by closures imposed by the Covid-19 health emergency, which shifted contacts with customers predominantly to digital channels; in 2021, the number of visitors at branches was limited to those with appointments.

Table no. 35 – Water: performance of toll-free numbers and branches (2020-2021) (*)

| TOLL-FREE NUMBERS | | | |
|--|-----------|-----------|-----------|
| | u. m. | 2020 | 2021 |
| COMMERCIAL TOLL-FREE NUMBER (Acea Ato 2 - city and province of Rome) (**) | | | |
| total calls received | no. | 1,021,728 | 1,059,740 |
| total answers | no. | 905,658 | 952,917 |
| service level (% of answers to calls received) | % | 88.6% | 89.9% |
| average waiting time before answer | min. sec. | 2'22" | 2'17" |
| average conversation time | min. sec. | 4'25" | 4'30" |
| FAULT TOLL-FREE NUMBER (Acea Ato 2 - city and province of Rome) (***) | | | |
| total calls received | no. | 462,063 | 427,973 |
| total answers | no. | 460,352 | 423,858 |
| service level (% of answers to calls received) | % | 99.6% | 99.0% |
| average waiting time before answer | min. sec. | 0'16" | 0'15" |
| average conversation time | min. sec. | 2'34" | 3'02" |
| COMMERCIAL TOLL-FREE NUMBER (Acea Ato 5 – Frosinone and province) | | | |
| total calls received | no. | 248,266 | 293,023 |
| total answers | no. | 210,167 | 249,970 |
| service level (% of answers to calls received) | % | 84.7% | 85.3% |
| average waiting time before answer | min. sec. | 2'19" | 2'42" |
| average conversation time | min. sec. | 3'56" | 4'09" |
| FAULT TOLL-FREE NUMBER (Acea Ato 5 - city and province of Frosinone) (****) | | | |
| total calls received | no. | 138,916 | 149,171 |
| total answers | no. | 128,190 | 120,255 |
| service level (% of answers to calls received) | % | 92.3% | 80.6% |
| average waiting time before answer | min. sec. | 0'40" | 0'53" |
| average conversation time | min. sec. | 2'20" | 3'55" |
| COMMERCIAL TOLL-FREE NUMBER (GESESA - city and province of Benevento) | | | |
| total calls received | no. | 27,078 | 38,475 |
| total answers | no. | 21,166 | 28,264 |
| service level (% of answers to calls received) | % | 78.2% | 73.5% |
| average waiting time before answer | min. sec. | 2'34" | 3'08" |
| average conversation time | min. sec. | 4'38" | 5'00" |
| FAULT TOLL-FREE NUMBER (GESESA - city and province of Benevento) | | | |
| total calls received | no. | 15,814 | 16,708 |
| total answers | no. | 13,046 | 14,007 |
| service level (% of answers to calls received) | % | 82.5% | 83.8% |
| average waiting time before answer | min. sec. | 1'25" | 1'12" |
| average conversation time | min. sec. | 2'17" | 2'27" |
| COMMERCIAL TOLL-FREE NUMBER (GORI - Naples and Salerno provinces) | | | |
| total calls received | no. | 505,439 | 588,292 |
| total answers | no. | 389,950 | 458,648 |
| service level (% of answers to calls received) | % | 77.2% | 78.0% |
| average waiting time before answer | min. sec. | 4'52" | 4'51" |
| average conversation time | min. sec. | 5'33" | 5'09" |
| FAULT TOLL-FREE NUMBER (GORI - Naples and Salerno provinces) | | | |
| total calls received | no. | 153,900 | 131,595 |
| total answers | no. | 141,000 | 125,845 |
| service level (% of answers to calls received) | % | 91.6% | 95.6% |
| average waiting time before answer | min. sec. | 1'03" | 0'52" |
| average conversation time | min. sec. | 3'08" | 3'26" |

COMMERCIAL TOLL-FREE NUMBER (AdF - provinces of Grosseto and Siena) (**)**

| | | | |
|--|-----------|---------|---------|
| total calls received | no. | 199,863 | 212,763 |
| total answers | no. | 177,622 | 190,833 |
| service level (% of answers to calls received) | % | 88.9% | 89.7% |
| average waiting time before answer | min. sec. | 3'02" | 2'18" |
| average conversation time | min. sec. | 5'10" | 5'50" |

FAULT TOLL-FREE NUMBER (AdF - provinces of Grosseto and Siena) (**)**

| | | | |
|--|-----------|--------|--------|
| total calls received | no. | 71,284 | 57,793 |
| total answers | no. | 67,890 | 56,355 |
| service level (% of answers to calls received) | % | 95.2% | 97.5% |
| average waiting time before answer | min. sec. | 0'50" | 0'43" |
| average conversation time | min. sec. | 3'32" | 3'35" |

BRANCHES (**)****ACEA ATO 2 (Rome - head office branch) (**)**

| | | | |
|---|-----------|--------|--------|
| tickets issued | no. | 21,585 | 17,398 |
| customers served | no. | 21,536 | 17,293 |
| service level (% customers served/tickets issued) | % | 99.8% | 99.4% |
| average waiting time | min. sec. | 4'00" | 1'00" |
| average service time | min. sec. | 17'35" | 18'55" |

ACEA ATO 5 (2 branches city and province of Frosinone)

| | | | |
|---|-----------|--------|--------|
| tickets issued | no. | 23,945 | 14,896 |
| customers served | no. | 23,945 | 14,896 |
| service level (% customers served/tickets issued) | % | 100% | 100% |
| average waiting time | min. sec. | 10'00" | 1'15" |
| average service time | min. sec. | 9'50" | 16'12" |

GESESA (1 branch Benevento and province) (***)**

| | | | |
|---|-----------|-----|--------|
| tickets issued | no. | n/a | 5,563 |
| customers served | no. | n/a | 5,562 |
| service level (% customers served/tickets issued) | % | n/a | 100% |
| average waiting time | min. sec. | n/a | 0'42" |
| average service time | min. sec. | n/a | 14'42" |

GORI (6 branches in the provinces of Naples and Salerno)

| | | | |
|--|-----------|--------|--------|
| tickets issued | no. | 42,609 | 44,602 |
| customers served | no. | 40,397 | 42,103 |
| service level (% customers served/tickets issued) (****) | % | 98.4% | 94.4% |
| average waiting time | min. sec. | 14'32" | 13'13" |
| average service time | min. sec. | 10'21" | 16'43" |

AdF (7 branches in the provinces of Grosseto and Siena) (***)**

| | | | |
|---|-----------|--------|--------|
| tickets issued | no. | 7,253 | 6,359 |
| customers served | no. | 7,253 | 6,359 |
| service level (% customers served/tickets issued) | % | 100% | 100% |
| average waiting time | min. sec. | 6'00" | 2'00" |
| average service time | min. sec. | 13'00" | 15'00" |

(*) The volumes of channels subject to sector regulation are consistent with the calculation methods envisaged for reporting to ARERA. For example, for the fault toll-free number, 'total answers' means, in line with the Authority's guidelines, 'total answers within TMA' and 'service level' means the % of calls with TMA within the standard.

(**) the 2021 figures of Acea Ato 2 for both toll-free numbers and the branch are being consolidated and have not yet been communicated to the Authority.

(***) Calls handled by the automatic system or terminated by the customer during navigation within the interactive voice responder are also considered as answers. The figures of the 2021 fault toll-free number are still being consolidated.

(****) The 2020 figures have been adjusted for consolidation in line with what has been communicated to the Authority (for commercial toll-free number: total calls received, total answers, service level), while the 2021 figures are being consolidated and have not yet been communicated to the Authority.

(*****) Figures of branches were highly influenced in 2020 by closures imposed by the Covid-19 health emergency, which shifted contacts with customers predominantly to digital channels; in 2021, access to branches was only allowed to those with appointments.

(******) The closure of branches in 2020, due to the health emergency, and a technical failure of the queue manager meant that the data needed to monitor trends in waiting times were not available; even the 2021 data must be considered partial.

(******) The 2020 data have been adjusted for consolidation in line with what has been communicated to the Authority (for the branches of Grosseto and Siena provinces: tickets issued, customers served, service level, average service time), while the 2021 data are being consolidated and have not yet been communicated to the Authority. The 2020 values in relation to the branches refer to 7 branches in the first two months and 2 branches, with appointment-based access, in the second half of the year, after the lockdown. For 2021, the values refer to 2 branches accessible by appointment only.

COMMUNICATION, EVENTS AND SOLIDARITY



18° Press, Outdoor & Promotion Key Award for the **Acea un'innovazione lunga 111 anni** campaign, communicating the Group's values and commitment to the territory



Acea Green Cup, first edition 2021: awarding the **Group's most sustainable projects**



Acea Scuola 2021 online edition: approximately **25,000** users viewed **Siamo Energia!**



Launch of the **Acea Museo Immersivo - MIA**: a virtual journey celebrating the Group's history and documentary heritage

COMMUNICATION

The **Communication Function** of the **Holding directs and coordinates communication and information strategies and initiatives**, defining the **development of the Group image**. It oversees **information coverage by journalists** and looks after the management of **relations with the media**, including the drafting and dissemination of non-price-sensitive press releases, the preparation of press reviews and the organisation of press conferences for the various business areas. It also coordinates **communication activities and internal dissemination** of documents, news and editorial content, **brand enhancement, management of corporate identity**, creation of **institutional, advertising and commercial campaigns**, organisation of **public or institutional events**, development and management of **environmental education and solidarity projects**, as well as special projects and external events aimed at **strengthening the bond between Acea and the territory**.

In-house expertise also covers the design and production of **photographic and video services**, management of the **Group's modern and historic documentary and photographic archives**, and the **promotion of Acea sites/plants for educational and cultural purposes**.

The Communication Function also defines **digital strategy** and **digital identity**, in line with the strategic guidelines defined by Top Management, the positioning of the Group in the digital ecosystem, through the design, development and management of **the institutional website** and the websites of the Companies that align with the corporate identity. It is responsible for the operational management of **social media channels** to **disseminate and enhance, in addition to news and information about the Group, brand awareness, the Group's values and mission** and the initiatives it carries out.

In 2021, the Group's **advertising communication focused on innovation and value creation**, with special attention to the territory and people. In April, **with the aim of enhancing the Group's brand reputation**, a campaign entitled "**Acea, 111 years of innovation**" was launched in the main national and local newspapers, both online and in print, with the aim of illustrating how Acea's values are evident and recognisable throughout its history (see the dedicated box).

ACEA UN'INNOVAZIONE LUNGA 111 ANNI (ACEA, 111 YEARS OF INNOVATION)

In response to the need to enhance the Group's brand reputation, **with its Acea 111 years of innovation campaign**, Acea has **designed and developed**, entirely with internal resources, an **institutional campaign** in the main national and local newspapers, online and in print. The aim was to **communicate Acea Group's values, by underlining its closeness to the area and people** that characterises it, and the **important path of innovation undertaken**, which supports the improvement and effectiveness of the public utility services managed: from water to energy, up to the treatment and enhancement of waste. Acea accompanies its customers towards a more sustainable to-

morrow and contributes to making the cities in which it operates smarter. The payoff chosen for the campaign is 'The future is our environment'. This was a very substantial communication effort, lasting over one month, with a total of **50 appearances in the press** with high-impact print formats and over 10 million web impressions. With this national campaign, **on air on 26 April 2021**, Acea wanted to communicate its great commitment to creating value for the country every day.

In September, **the campaign was awarded the 18° Press, Outdoor & Promotion Key Award** for the Transport and Energy category.

The year's communication was also characterised by a focus on innovation. Starting in January, in fact, the **Digital Branch** campaign went on air for three months to communicate the digitalisation of the Water Area through the new branch available to customers, and in July, to encourage customers to use digital channels, a **campaign dedicated to the web bill** was created for Acea Ato 2 and Acea Ato 5, to communicate the characteristics of the new interactive digital bill: immediacy, digitalisation and simplicity. The campaign was in print, outdoor, digital and aired on the radio. Lastly, in April, **an important information campaign was launched** for the same companies operating in the water sector, using various forms of communication (press, digital, BTL and posters) **to encourage the use of the social water bonus**.

To support the communication of the energy industrial area (commercial & trading), a campaign for **Acea Energia** was launched in April 2021: **E-Mobility**, aimed at underlining its commitment to sustainable mobility, with the launch of Acea's **new e-mobility app**, full of services that facilitate the use of electric vehicles. The campaign was developed in targeted and crossing actions in-

volving several media (print, digital programmatic and reservation, outdoor). **Acea Energia's 100% Eco Green** communication campaign was also launched in June and July, aimed at improving brand reputation by highlighting the company's increasingly clear-cut decisions to **protect the environment and reduce carbon dioxide emissions** (see box in the Customer Care section). The campaign, which had a significant media response involving two exceptional testimonials, Emanuela Fanelli and Frank Matano, was developed in targeted and crossing actions that involved several media, with over 1,300 radio spots, press, video strategy on digital, TV commercials and 1,800 outdoor installations.

The Group's commitment to students also continued in 2021 with the creation in June of the entirely digital event "**Acea School We Are Energy! Turn off the light and turn on your imagination**", a training course that enabled teens to experience and learn about the world of energy, alternative energy sources and to raise their awareness of a more conscious use of energy, also to protect environmental resources (see the dedicated box).

DIGITAL EDITION 2021/2022 OF ACEA SCHOOL WE ARE ENERGY! TURN OFF THE LIGHT AND TURN ON YOUR IMAGINATION

After the first **digital edition** of the educational event to **raise awareness of environmental sustainability**, which for years has involved thousands of people, **Acea has renewed the appointment in 2020, dedicated in 2021 to the world of energy**.

For this edition, Acea **wanted to reserve the preview of the event to its employees**, opening it afterwards to the entire national territory in the period from 10 to 17 June, **reaching about 25,000 users**; the project **will be proposed to the students** of Rome and the Metropolitan City **in the first months of 2022**.

Users of the initiative were able to access the event via the dedicated Acea web page. The route, with a 3D video game-style setting, is divided into three "worlds": Energy, Artistic Lighting and Sustainability, wanted to offer participants a multimedia experience to learn about the innovative actions, renewable energy projects and digital technologies implemented by the Group, in order to make them aware of the complexity of sustainability and energy saving, while enhancing the beauty of public and artistic lighting. The talented Valerio Mazzei took part in the event as guide.

The possibility of **using remote access** also concerned two other important events **organised by Acea in 2021**: in July, the **Innovation Day** entitled Builders of the Future was held, viewed by about 5,000 people in live streaming and about 200,000 social media views online and offline. In November, the **Sustainability Day** was on the subject of 'a fair and sustainable ecological transition', broadcast via streaming on a dedicated platform and live on CorriereTV with over 900,000 video views (see the in-depth boxes in the Institutions and the Company chapters, where the Group's commitment to research and innovation is illustrated, and in the Strategy

and Sustainability chapter of *Corporate Identity*).

In September, with the collaboration of Marevivo and 100Vele, the Group also organised the first **Acea Green Cup**, in the area in front of the Port of Ostia, a regatta reserved for Group employees was held with the aim of raising awareness of sustainability and environmental protection throughout the Acea world (see box with details). Also in September, Acea launched MIA, Acea's **Immersive Museum**, which allows visitors to retrace, thanks to a dedicated portal, over 110 years of the company's history and, in parallel, that of the city of Rome (see the dedicated box).

ACEA GREEN CUP 2021

Acea organised a sailing race on 26 September 2021 dedicated to the Sustainable Development Goals of the 2030 Agenda. The **Acea Green Cup** regatta, organised in collaboration with Marevivo and 100Vele, sponsored by the Ministry of Ecological Transition, saw the participation of 14 crews made up of Acea Group employees from 21 companies, who competed over a 4.5-mile course. The occasion was intended to strengthen the sense of teamwork and also to **highlight the projects implemented by the Group with positive effects on the natural environment and the social context**. In addition to competing in the sports competition, **each participating**

team also presented a project in an internal contest, which rewarded the projects judged to be the most valid in terms of sustainability. Among the projects presented: the digital branch of Acea Ato 2, which helped ensure continuity in customer relations during the closure of physical branches imposed by the health crisis; AdF's circular economy protocol, in support of local businesses; GORI's Energies for the Sarno, for the protection of the river ecosystem; and many others. A special mention went to the Vaccination Hub, set up by Acea in the former car park and open to all residents.



ACEA LAUNCHES THE MIA

The **Acea Immersive Museum** was presented at a press conference held on 30 September 2021 at the Montemartini Power Station. This is a virtual tour, on a dedicated platform, which through photographs, videos, plans, charts, 3D images and the reproduction of paper documents and artefacts allows us to retrace the evolution of Acea and the Capital. The immersive museum was created thanks to a major redevelopment and digitisation of the company's historical documentary heritage, which is still in progress and includes: **more than 30,000 photographs**, almost 500 registers of minutes

and resolutions, thousands of technical documents. Acea's historical archive also includes the 14,000 volumes of the company library and about **80 historical film clips**. Browsing the platform, in addition to accessing the virtual exhibition consisting of 12 rooms, it is also possible to view the unprecedented archival heritage through theme photo galleries and to enter a digital "Conference Centre" where you can watch the cultural events that will be organised by the company. The new portal is already active and can be found at www.museodigitale.gruppo.aceait.

The Communication Department is responsible for **Acea's presence at events such as Ecomondo and Maker Faire** (see the dedicated boxes in Relations with the Environment, *Environmental Sustainability and the Main Challenges* and the chapter Institutions and the Company), as well as at **conferences and other initiatives**, referred to below. It also **coordinates visits to the Group's plants**, which before 2020 had been a frequent destination for visitors interested in technical and scientific aspects, as well as students, thanks to the willingness of the employees responsible for guiding them around the sites, but which in 2021, due to the **continuing Covid-19 pandemic emergency**, were unable to receive visitors.

The Group's digital strategy and digital identity, as mentioned, are defined within the Communication Department by the **Digital and Corporate Media** Unit, which manages communication on digital channels. The **corporate website** (www.gruppo.aceait) therefore expresses the **Group's values, mission and industrial positioning**. **The Group's website tells the story of the company**, highlighting its commitment to **sustainability and innovation**, transversal elements that increasingly characterise its way of working to guarantee the greatest efficiency in services rendered to customers, thanks also to the quality of the work of its people and its **daily commitment to the territories in which it operates**.

In addition to **corporate content**, the site features an **area dedicat-**

ed to Acea's services and initiatives. Through an in-depth **analysis of positioning and digital strategy**, the information on the site is organised clearly. In addition, it provides a smooth and intuitive navigation, with a particular attention to **visual communication**, also thanks to distinctive graphics, consistent with the Group's brand identity.

Acea's commitment to effective communication, in terms of the transparency and quality of the content available on its institutional website, has also been recognised in its placement in sector rankings. The result of the work on the Group's entire digital ecosystem has further strengthened Acea's presence **in the top 10 of Webranking Italy 2021-2022**, the research conducted by Lundquist and Comprend that assesses the **transparency of corporate and financial communication on the digital channels** of the main Italian listed companies. Compared to last year, the Group **moved up two places to eighth place** and gained an additional star, thus entering the **category of "5-star companies"** for the first time. Acea was mentioned in the **best practice ranking for the presentation of the company** in the Getting to Know Acea section of the website (www.gruppo.aceait/conoscere-aceait). The research showed that the business areas and the mission are described in a clear and transparent way, thanks also to precise data and infographics that give substance to the information and make it easier to understand. During the year, the **Acea website** highlighted the **initiatives un-**

dertaken to ensure the continuity of services and express closeness to the community, in the face of the **continuing health emergency caused by Covid-19**, through the constant **updating of the page dedicated to this information**, including the **opening of the Acea Vaccine Hub**.

The website gave space to the **main events of 2021**, organised by the Company or in which the Group took part, mentioned above,

and highlighted **the events to which the Company has long linked its brand**, through sponsorships (see the dedicated paragraph below), such as the **Rome Marathon** and the **Film Festival**. Also worth mentioning are the **2021 Christmas light decorations**: Acea joined the campaign **"Christmas in Rome - Let's give the gift of a sustainable city"**, promoted by the **FAO and Roma Capitale** to raise awareness on the **17 SDGs of the 2030 Agenda**.



In 2021, the **section of the website dedicated to "stories"** was enriched with new content, telling the story of the Acea Group and its commitment to the community and the territory, combining the human dimension, technology and sustainability. In particular, as well as being dealt with in the reference section **"Our Commitment"**, **sustainability** is highlighted on all pages of the website as a key element for the Group's growth and value creation, with refer-

ences to **dedicated initiatives and projects in each area**.

In addition, the website also highlighted the **artistic lighting projects** of monuments and the main **symbolic lightings** that concerned activities to **raise awareness among citizens** for the prevention of diseases such as breast cancer or other events with a high social impact (photo gallery on the corporate website).



Every year, on the occasion of the **Shareholders' Meeting**, the Acea Group's "Navigable Financial Statements" are published on the web-site, making the **Consolidated Financial Statements** and **Sustainability Report** available for viewing in interactive mode, with open data and multimedia content. The online reports present Acea's results, values and projects and allow visitors to **grasp the multiple connections that link the two annual reports on one screen**.

The website also performs a **service function**, with the **timely publication of notices** about any water stoppages affecting the areas where the Company operates. For several years, it has provided data about **emissions**, monitored in real time, from the Group's two **waste-to-energy** facilities and the **Tor di Valle power plant**, and the **main parameters of the quality of the water** supplied by companies that operate in the water industry can be consulted online. Lastly, the company website has given visibility to the **environmental video declarations** that illustrate Acea Ambiente's commitment to safeguarding the territory and reducing CO₂ emissions, for which the company received a special mention from ISPRA during the Ecomondo event.

In May 2021, **Areti's new website** (www.aret.it) went online. It features information content aimed at electricity distribution users, **offering smooth navigation and an effective user experience** as well as quick and clear access to a single reserved area to manage utilities and services. The website also aims to effectively disclose the company's projects, and devotes, for example, an area to the 2G meter replacement plan. In addition to **creating a digital identity consistent with the company's brand**, a content strategy was defined for positioning Areti on search engines.

In addition, the mini-site of **Acea Innovation** (www.aceainnovation.it), the Group company dedicated to the development of innovative services associated with the world of energy and ecological transition, **went online in July 2021**. The mini-site, **hosted within the Group's website**, was created to introduce Acea Innovation to a wide audience and as a contact tool for customers interested in the services

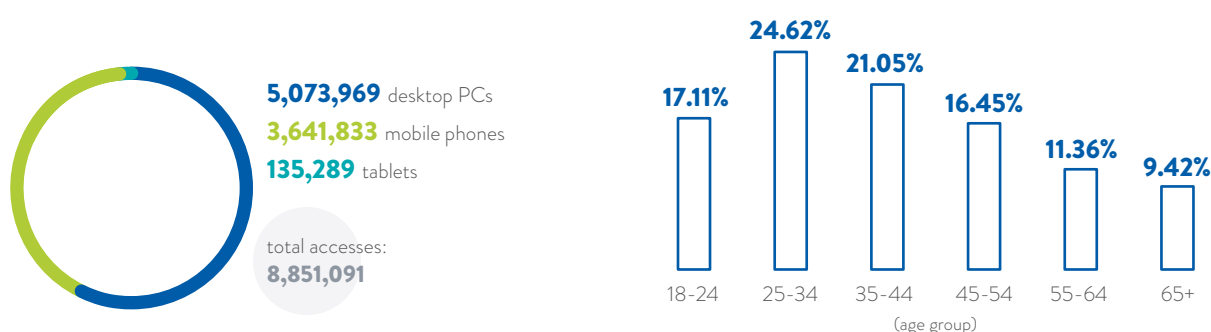
offered: **sustainable mobility, widespread composting and energy requalification**. To this end, the most effective customer journey has been studied and a form has been created through which the user can leave his data to be contacted. In order to strengthen the Company's image, an ad hoc visual and digital identity was created, aligned with the Group's brands and digital guidelines.

The Group's website is active on the domain www.gruppo.acea.it. During the year, there were approximately **31.8 million page views** (an increase of about 7% compared to 2020), representing **8.8 million hits**. The **desktop** connection mode prevails, accounting for **57.3% of accesses** (5,073,969), and the increase in access to the site via **mobile** phone is confirmed, with 3,641,833 accesses or **41.2% of accesses in 2021** - the figure was 37.2% of accesses in 2020 - while access via **tablet** remains low, 135,289 accesses in the year, or **1.53%**. Most visitors are in the **25-44 age group**.

On **Acea Energia's website** (www.acea.it), **more than 2.9 million hits were recorded in 2021**, an increase of about 12% compared to 2020. Again, access was predominantly from desktops (51%), mobile phone use is growing (47% of accesses compared to 39% in 2020), while access from tablets remained stable at 2%. The site, dedicated to the **sale of electricity and gas for the free market**, has sections dedicated to **"guides"** and **"stories"**, where useful information is provided to users on topics such as **innovation in the energy sector, wind energy, e-mobility, energy saving**, etc., which account for about 15% of total access to the site; **navigation is user friendly**, to encourage the customer journey and interaction with all touchpoints. In 2021, particular visibility was given to Acea Energia's offers focused on sustainability and environmental protection, with the **100% ECO** offer (see Customer care section).

The www.servizioelettricoroma.it website, which is **dedicated to Acea Energia's customers with standard market service**, had **534,796 hits** in 2021, up 33% on 2020 (around 400,000 hits), with 66% connected via desktop, 32% via mobile phone and 2% via tablet.

Chart no. 33 – Acea 2021 corporate website by access modes and age groups



The strengthening of Acea's presence on social media continued in 2021 (see the dedicated box), with careful planning, a storytelling strategy and content declined for each channel with the aim of

highlighting the elements that have characterised Acea's commitment during the year, in line with the communication tone of the Group's institutional website.

ACEA NUMBERS ON SOCIAL MEDIA

Acea **has consolidated its presence on the main social channels during 2021**. Here are the key figures:

The Acea Group's **Facebook** channel, which focuses on corporate content and supported cultural events, has reached a fan base of around 6,302 followers, an increase of 34.4% compared to 2020, and achieved **over 4.8 million clicks**, including video views. Thanks to constant moderation, **user enquiries** received on the page are **directed to the dedicated support channels**.

The **Instagram** profile, with direct and informal communication aimed at talking about Acea's commitment to the area, counts about 4,771 followers (+31% compared to 2020) and received 13,073 clicks.

The **Twitter** profile, which is one of the main touchpoints for interaction with **institutional stakeholders** and **updates on corporate content and Group results**, has over 4,783 followers (+6.1 compared to 2020) who interact with Acea through comments and shares (14,993 interactions).

The **LinkedIn** profile shows a steady increase in the number of followers, which now stands at **61,145** (almost **32%** more than in 2020), with 22,538 interactions over the year. On this channel Acea reinforces its role as a multi-utility company in order to attract talented and skilled workers.

The **YouTube** profile, where Acea's videos are collected, has 1,080 subscribers (+14.4% compared to 2020).

The Group is also present on **Facebook** and **Instagram** with **Acea Energia**. Both channels were used for the promotion of electricity and gas offers and for the dissemination of commercial initiatives on the free market, also with the support of **special influencer marketing projects**. Facebook and Instagram respectively reached 14,405 (+2.6% compared to 2020) and 1,125 followers (+60.4% compared to 2020) and both have become important touchpoints for **managing customer requests**, also by inviting customers to use online services available in the MyAcea customer area of the website www.acea.it.

The **Media Relations Unit** oversees **relations with the national and local media**, with a view to mutual respect of roles and cooperation, in order to convey, through the media, the correct corporate image and position of the Group. Through press articles, television, radio and web reports, the Unit guarantees **media coverage of Acea's main events and initiatives**, including those in the field of value liberality and sponsorship, enhancing **corporate communication** content. Moreover, to highlight the main news stories concerning the Group, **starting from October 2021**, in collaboration with Acea Communication and Internal Communication, the Unit is in charge of the creation of videos on **Acea News**, published weekly **on the intranet and on the corporate website**.

Press releases and press conferences in 2021 disclosed **the economic results achieved, the initiatives carried out** by the Group and **information of public interest** relating to the provision of services. Together with Digital and Corporate Media, in coordination with other Functions/Departments of the Holding Company, such as Investor Relations & Sustainability, Legal and Corporate Affairs and Administration, Finance and Control, Media Relation handles the **dissemination of press releases relating to major corporate events**, such as the **Shareholders' Meeting**.

The link **with the operating companies** also allows the Unit to **provide feedback to reports of inefficiencies** coming from the media, interacting with press editors willing to publish the company's replies.

Media Relation manages the national and local **press review** on a daily basis, making it **available through the company's Intranet**. This activity is complemented by the transmission of additional and timely information about the Group or relevant to the business managed, thanks to the regular **monitoring of press agencies** and the web (**web news, social media and blogs**).

Among the **communications that accompanied Acea's initiatives of particular importance during the year** are, **by way of example**:

- releases during the year, starting in January, concerning the **electric mobility sector and Acea Innovation's agreements with some Italian municipalities for the installation of charging infrastructure**. These include initiatives in Terni, Taranto, Baselga

di Piné and Benevento;

- communications, between April and July, of **Acea Energia's initiatives**, with the launch of the **App dedicated to recharging electric vehicles**, the promotion of the **100% green electricity and gas offer** and the launch of the **commercial partnership with Windtre**;
- communication actions, from May onwards, relating to the **opening and services of the Acea vaccination hub**, on company premises in Piazzale dei Partigiani made available to citizens;
- the communiqué, in June, with the Carabinieri concerning **the installation of the SmartComp at the Salvo d'Acquisto barracks**;
- releases, between June and September, which focused on innovative research, circular economy and engineering design. In June, **the European funding for the Promises project** won a call for proposals in relation to Horizon 2020; in August, Acea Elaborasi obtained **ICMQ BIM certification**; and in September, the launch of the **BIOREF experimental platform** with the CNR to develop new solutions for the recovery of organic waste;
- actions linked to the celebration and exploitation of **Innovation Day** (in July) and **Sustainability Day** (in November), organised by Acea;
- the events and announcements relating to the **work** carried out **throughout the year to upgrade the lighting, both artistically and functionally**, in collaboration with the Municipality of Rome, in places such as the Torretta Valadier at Ponte Milvio, Porta San Sebastiano and Piazza Farnese, as well as turning on the Christmas lights in Via del Corso, organised by Acea, and the lighting of the Cestia Pyramid in collaboration with ASviS, on the occasion of the fifth edition of the Festival of Sustainable Development;
- the October press release, during Ecomondo, which presented **the agreement with INSTM (Inter-university Consortium for Materials Science and Technology)** in view of the circular economy and the **Gasiforming patent**, for the transformation of non-recyclable plastics into eco-fuels, as well as the signing of the **memorandum of understanding with Ancitel Energia e Ambiente** for ecological transition.

EVENTS AND SOLIDARITY

The **economic value distributed to the community** (in terms of sponsorships, trade fairs, conferences, etc.) in 2021 is approximately **€ 8 million**⁸⁰ (it was € 7 million in 2020). Of this amount, some € 900,000 thousand have been earmarked for sponsoring cultural, social and sporting events. **Allocations by way of donations** for major initiatives amounted to approximately **€ 2 million** (€ 1.97 million in 2020).

Acea offers its services, such as the **supply of electricity and water or switching on/off public lighting**, on the occasion of events, or even in special circumstances of a solidarity and symbolic nature, such as, for example, special lighting/ switching off of the Coliseum, as part of the campaign to raise awareness of the fight against the death penalty or on World Blood Donor Day, of the Senate Palace, for the International Day for the Elimination of Violence against Women or on the occasion of the "Earth-Hour", and of Lazio Region Palace or other emblematic buildings, on the occasion of particular anniversaries, such as the Pink October campaign and many others, as on the occasion of the Festival of Sustainable Development, with the special lighting of the Cesta Pyramid. These services, referred to as **'technical sponsorships'**, had a **total economic value**

of around € 336,000 in 2021.

The company participates in the main events related to its business activities and supports, every year, **including with sponsorships**, initiatives considered of high cultural and social value **for the development of the areas it operates in and for the benefit of the community** (see also the boxes at the end of the section). The **Sponsorship and Value Liberality** Function **advises on and manages requests** from the entire region and from the Group's corporate structures, **to submit them to the Executive Committee**, a body with responsibility for Institutional Relations, Sponsorships and Donations. The sponsorship initiatives approved by the Executive Committee are subject to an *Integrity Due Diligence*, for an ethical and reputational assessment of the proponents, according to best practices.

In view of the continuing pandemic emergency, **Acea has continued to support hospitals and public assistance structures**, allocating to them a portion of the funds allocated to sponsorships (see the dedicated box) and during the year carried out numerous other solidarity initiatives in the areas where it operates to support the most vulnerable (see also the initiatives, such as the "Solidarity Taxi" illustrated in the Diversity, Inclusion and Welfare section in the Personnel chapter).

ACEA'S FIGHT AGAINST THE COVID-19 EMERGENCY

Again in 2021, **Acea continued to support the local entities that have been working in the front line**, through intense economic and technical support. It therefore approved appropriations for the Biomedical Campus for the construction of the Vaccine Centre, to serve the community, and donations for the Policlinico Gemelli for

the renovation of the Pneumology Department and the Bambino Gesù Paediatric Hospital for the creation of a Molecular Diagnostic Laboratory. It has also installed donated tablet recharging stations at the Policlinico Umberto I for use by patients who have contracted Covid-19 and have been admitted to the hospital.

ACEA SUPPORTS THE ENERGY IN THE SUBURBS PROJECT

On 14 December, the **Manifesto "Together to fight energy poverty"** was presented at the Stables of Palazzo Altieri in Rome. It was **promoted by the Energy Bank** and endorsed by companies, organisations, associations and non-profit organisations. The aim of the initiative was to raise awareness among public opinion and institutions and to put in place concrete actions to tackle vulnerable situations on this issue through the creation of **a network of stakeholders who share the Bank's mission**. Consumer and environmental asso-

ciations, third sector organisations and the main Italian multi-utility companies, including Acea, have joined the Manifesto.

In this context, **in 2021 Acea supported the "Energy in the suburbs" project**, an initiative sponsored by Lazio Region and carried out with Energy Bank and numerous other institutional, business and third sector partners, to tackle situations of energy poverty and support families in difficulty living in Rome's suburbs, particularly in the Alessandrino and Torpignattara districts.

In compliance with restrictive and safety measures, which have continued into 2021, **Acea has continued to support cultural and socially interesting events**, with the aim of **supporting the revitalisation of the area and helping to return places of social encounter**, whether physical or virtual, to the citizens after the long period of isolation.

Among the main events supported in 2021, two major exhibitions stand out: the **Klimt** exhibition. **The Secession and Italy**, open in Rome from October 2021 to March 2022 at Braschi Palace, which made some 200 works by the great Austrian painter and other artists in his circle exceptionally accessible, tracing the artistic stages and relations with Italy. Also, the exhibition **1849-1871 Roman Jews between segregation and emancipation**, set up at the Jewish Muse-

um of Rome, between November 2021 and May 2022, has been showing about 70 works by Jewish soldier-painters together with masterpieces of 19th century Italian art, including paintings, sculptures, manuscripts and photographs aimed at bringing to mind the events that led to the breach of Porta Pia and the proclamation of Rome as capital city.

In 2021, in order to promote the resumption of theatrical, musical and cinematographic activities, Acea once again became a private partner of the **Rome Opera Theatre** Foundation and sponsored shows at both the Opera Theatre and Caracalla; it also sponsored the 2021 editions of the **Two Worlds Festival of Spoleto**, the **100 Città in musica** initiative, the **Film Festival** at Rome's Auditorium Parco della Musica, and other similar local initiatives, such as the 2021

⁸⁰ This item also includes expenses incurred for 'trade fairs and conference' but not 'technical' sponsorships.

Etruria Eco Festival, the 2021 Tolfa Jazz Festival, etc.

Alongside entrepreneurial initiatives for young people and the **promotion of innovation**, Acea sponsored the **Technology and Scientific Research Week**, held at the Ettore Majorana Industrial Technical Institute in Cassino. Together with the National Association of Young Innovators, it **awarded the ANGI 2021 Prize**, which conveys a message and commitment to technological development to the **best innovation leaders** and supported the creation of an exhibition and relevant catalogue to present the projects of the **Italian Smart Design** competition.

Among the main sporting events of the year, Acea associated its brand with the Rome Marathon – **Acea Run Rome The Marathon** – and the **Rome-Ostia Half Marathon**; both events, of great importance for the capital, could in fact be held again on 19 September

and 17 October 2021, respectively, after being suspended in 2020 due to the pandemic situation. Acea has sponsored numerous other sports initiatives and some teams, such as Frosinone Soccer, Virtus Basket Siena, Santa Lucia Basket, the Italian wheelchair basketball team, and has supported, as every year, initiatives aimed at children such as **School Volleyball - Acea Trophy** (see the dedicated box) and **Acea Camp**. **Started in 2015 from an idea of Carlton Myers and thanks to the support of Acea**, every summer, at the end of the school year, the latter initiative has offered the opportunity to thousands of children, aged between 6 and 16, **to practice more than a dozen different individual and team sports**, at a sustainable cost for families and accepts, first of all, those with greater economic difficulties.



VOLLEYBALL SCHOOL - ACEA TROPHY: NEW FORMAT 2021

With a focus on the promotion of the values conveyed by sports, every year Acea supports events that concern children in particular, combining them with awareness of sustainability issues. In particular, the 2021 edition of the **School Volleyball Tournament - Acea Trophy**, dedicated to **high schools in the city and province of Rome** and organised by FIPAV Lazio (Volleyball Association), was presented with the claim **“V as in School Volleyball. V as in Values”**. Due to the health emergency, it was not possible to hold the school tournament in its traditional form, but the organisers wanted to continue to involve thousands of young people by organising **28 online seminars** as distance learning, with high-profile speakers and testimonials from the world of sport. The event took place between 8 March and 26 April and the students addressed topics such as: Conscious use of water; Zero Hunger - Sustainable Development

Goals; Conscious use of the web and social media with reference to grooming and sexting; Bullying and cyberbullying; The values of sport; Blood donation; No to addictions: drugs, alcohol and youth gambling. The Acea School Volleyball Trophy 2021 poster reads as follows: “Combining education with sustainability issues and the preservation of natural resources with sports competition offers young people an educational, interdisciplinary and social experience. A path of values that Acea has always promoted.” Acea President Michaela Castelli said: “For the 2021 edition as well we aim to combine sports with education and raising awareness in the new generations on the issues of sustainability and protection of natural resources, in particular water. With various webinars and educational events we will tell children why water is a universal good.”

The following boxes describe the **main events supported by the Acea Group in 2021**, through sponsorships or donations.

2021: ACEA FOR CULTURE, INNOVATION AND SUSTAINABILITY

sponsor of the exhibition "**Klimt, the Secession and Italy**", held at the Museum of Rome - Braschi Palace, from 26 October 2021 to 27 March 2022, dedicated to the famous Austrian painter (ZetemaProgetto Cultura Srl)

sponsor of the exhibition "**1849-1871 Roman Jews between segregation and emancipation**", held at the Jewish Museum of Rome, between November 2021 and May 2022, aimed at bringing to mind the events that led to the breach of Porta Pia and the proclamation of Rome as capital city (Jewish Community of Rome)

contribution as private partner and sponsor of the 2020/2021 and 2021/2022 theatre seasons of the **Rome Opera Theatre** (Rome Opera Theatre Foundation)

partner sponsor of the 16th edition of the **Rome Film Festival**, that took place from 14-24 October 2021 (Cinema Foundation for Rome)

sponsorship of the publication **From the breach of Porta Pia to Rome of the people - 150 years of Roma Capitale** (C.O.R. Srl)

sponsor of **100 Cities in Music 2021**, dedicated to the promotion of live music through the organisation of performances at low prices or free admission in 14 municipalities in Lazio (European Music Cultural Association)

sponsor of the **2021 Two Worlds Festival**, the international music event held in Spoleto between 26 June and 11 July 2021 (Two Worlds Festival Foundation)

sponsor of several cultural initiatives and summer events outside Rome, such as the **Tolfa Jazz Festival 2021** (ETRA Cultural Association), the **Etruria Eco Festival 2021** (Kick Srl), the **Civitavecchia Summer Festival 2021** (Music Station Cultural Association), the 2021/2022 theatre and film season of the **Narzio Theatre/Cinema** in Subiaco, the **Reate Festival 2021** (Vespasiano Foundation)

sponsor of the **ANGI Prize 2021**, rewarding the best initiatives of young Italians, and participated in the Innovation Technical Table at the Chamber of Deputies (National Association of Young Innovators)

Sponsor of the realisation of an exhibition, and relevant catalogue, in the context of the **national Italian Smart Design competition** for students and recent graduates in architecture and design on the development of sustainable smart urban system projects, aimed at presenting the projects (Sicrea Srl)

sponsor of **Forum PA Smart City - Digital Agenda 2021**, which scheduled a series of webinars on the topic between 21 and 25 June (FPA Srl)

sponsor of the **Technology and Scientific Research Week**, at the Ettore Majorana Technical Scientific Institute in Cassino, which promotes meetings with the manufacturing, social, economic and academic world and, in 2021, focused on the implementation of innovative projects (ITIS Ettore Majorana)

technical sponsorship of the initiative "**I will use less light (Mi illumino di meno) 2021**", with the switching off of the Senate Palace to raise awareness of energy saving

technical sponsorship for the **2021 Sustainable Development Festival**, involving the projection of the **UN SDG logo on the Pyramid of Cestius**

2021: ACEA FOR SOLIDARITY

solidarity contributions linked to the Covid-19 emergency, aimed at upgrading or equipping healthcare infrastructure for hospital centres in Rome, such as **Policlinico Agostino Gemelli**, **Policlinico Universitario Campus Biomedico**, **Bambino Gesù** Children's Hospital, and the purchase of other equipment to improve patients' well-being during hospitalisation (**Policlinico Umberto I**).

contribution for awareness-raising activities in the framework of the **Campaign against childhood cancer**, which took place in Rome between 20 and 26 September 2021 (Peter Pan Association)

contribution to the **Charity Dinner**, an event attended by well-known people from the world of entertainment, aimed at **raising funds for the activities of the Bambino Gesù Children's Hospital**

contribution to the **2021 Fiaba Day** event, organised in Rome on 3 October 2021, to promote discussion and awareness of issues relating to the removal of architectural, psychological and sensory barriers, to ensure equal opportunities, accessibility and usability for everyone (Fiaba Non-profit)

contribution to the **Health Village** initiative, organised in Rome at the Circo Massimo between 7 and 10 October 2021, which every year offers screening for breast cancer, gynaecological and other diseases prevalent in women and numerous other initiatives to raise awareness of cancer prevention and health promotion (Susan G. Komen Italy)

contribution to support the activities of the **Mobile Unit** in the field of **health and inclusion**, to promote health monitoring, the dissemination of the vaccination plan and food support among the most vulnerable and needy (Sanità Frontiera Non-profit)

contribution to the **Energy in the Suburbs** project, which in 2021 focused on the Alessandrino and Torpignattara neighbourhoods; this is an initiative sponsored by Lazio Region and carried out with Energy Bank and other institutional partners to tackle situations of energy poverty, in support of families in difficulty (Energy Bank Non-profit)

contribution to the '**Safety at School**' project for the supply of technical and computer equipment to support teaching activities in the schools in the municipality of San Vittore del Lazio

participation in the **International Day for the Elimination of Violence against Women**, **World Autism Day**, **World Blood Donor Day**, the effort to raise awareness of the campaign to end the death penalty, **World Patient Safety Day**, with **technical sponsorships**, such as the special lighting of Senate Palace, the International House of Women, the Colosseum and the Lazio Region Palace

technical sponsorship with the pink lighting of the Senate Palace as part of the **Pink Ribbon 2021** (LILT - Italian League for the Fight Against Cancer) initiatives and again with the lighting of the Lazio Region Palace, on the occasion of the **Pink October 2021 campaign** and **International HPV Awareness Day**

2021: ACEA FOR SPORT AND YOUNG PEOPLE

sponsor of **Acea Run Rome The Marathon 2021**, the 42 km competitive road race, held in the capital on 19 September 2021, is the one with the most spectators (Infront Italy) and the most Italian and foreign athletes participating.

sponsor of the **Rome-Ostia Half Marathon 2021**, the most important running event over a distance of 21 km, to be held in Rome on 17 October 2021 (RCS Sport)

sponsor for the 2021 Serie B championship of **S.S.D. Santa Lucia Basket**, a **wheelchair basketball** club that has been active in the Roman sports scene since the 1960s (S.S.D. Santa Lucia Srl)

support to **sports and sports events** in the areas of operation outside Rome: **basketball** (ASD Virtus Basket Siena; ADS Orvieto Basket), **soccer** (Frosinone Soccer; Benevento Soccer; USD Monterotondo Marittimo), **running** (ASD Filippide - D. LF Chiusi Avis Castiglione del Lago, Amatori Podistica Terni, Athletic Terni), **cross-country running** (ASD Nissolino Atletica Velletri), **rugby** (Rugby Perugia), **hockey** (ADS Follonica Hockey 1952)

title sponsor of the 2021 edition of the **School Volleyball Tournament - Acea Trophy**, dedicated to **secondary schools in the city and province of Rome** and organised by FIPAV Lazio; the 2021 event consisted of 28 seminars by distance learning on social and environmental issues (FIPAV Lazio)

main sponsor of **Acea Camp 2021**, the event aimed at students, between 14 June and 9 July and between 12 July and 13 August 2021, with the aim of introducing and disseminating the practice of sports and raising awareness of social and environmental issues (Beside Management Srl)

sponsor of **Run For Autism 2021**, the 10 km competitive race and 5 km open to all, held in Rome on 24 October and promoted by Progetto Filippide, to raise awareness of autism and give hundreds of young people from all over Italy a special day (ASD Sport and Society Association - Filippide Project Rome)

sponsor of the **2021 "I'm Separating Wastes Too" project for schools**, which combines sports activities with educational activities on circular economy issues (ASD Virtus Basket Aprilia)

SUPPLIERS



Over **€ 2 billion** = total value of the 2021 Orders for goods, services and works (+66% compared to 2020): processed more than 6,480 orders/contracts of about **2,870 suppliers** involved



80% of **qualified suppliers** completed a self-assessment questionnaire on **sustainability-relevant aspects during the year**



The Construction Site Safety Unit carried out **15,444 safety inspections** at construction sites (+6% compared to 2020): downward trend in detected non-compliances



The first **"pilot"** of the **Safety Check** project was completed

CONSOLIDATED EXTERNAL COSTS

In 2021, the Group's **consolidated external costs** totalled about **€ 2.46 billion** (+23.9% compared to 2020). The largest increase is due to the electricity and gas item of € 1.72 billion (about € 1.33 billion in 2020), which had the greatest impact on distribution of expenses. There is an increase in the services item equal to around € 437 million (€ 378 million in 2020), influenced by the change in the scope of consolidation.

Procurement of goods, services and works related to the Group Companies subject to reporting are managed centrally by the **Purchases and Logistics** Function of the Parent Company⁸¹, with the exception of GORI, AdF and Gesesa, which independently manage their business. The **total value of the order** recorded in 2021, including the amounts of non-centrally managed water companies⁸², rises to **more than € 2 billion**, with an increase of about 66% compared to the previous year (about € 1.2 billion in 2020). With regard to the centrally managed companies, the value of procurement in 2021 is more than € 1.7 billion, compared to € 1.1 billion in 2020.

PROCUREMENT POLICIES

The Purchasing and Logistics Department of the Parent Company defines **policies and guidelines** and manages, as a service, the procurement of goods, services and works required by the Departments of the Holding Company and the main Group Companies. To perform its duties, it **values the technical skills of the buyers**, handles the **requests of "internal customers"** (Functions/Companies in the Group) and develops a **transparent relationship with suppliers**. The department also oversees the flow of **materials, logistics and warehouses** of the Group, managing the **operations of the central depot and most of the territorial depots of Areti and Acea Ato 2**, at the service of the operational personnel dispatched to the territory. It also supplies materials for scheduled and urgent works, interacting with most of the companies contracted by Areti and Acea Ato 2. After the testing and operation of the measurement laboratory for the verification of water meters built by Acea Elabori at the new shed of the logistics centre of Santa Palomba, set up in 2020, at the same site, **in 2021**, the setting up of the **low voltage laboratory of Areti** (Engineering and Testing Unit) **was also completed**.

81 For the NFS scope, see *Disclosing sustainability: methodological note*. With respect to this scope, neither the water companies GORI, AdF or Gesesa, which manage their procurement independently, nor the Berg or Demap companies or the photovoltaic companies (with the exception of Acea Solar and Acea Sun Capital, which are managed centrally) are managed at a centralised level.

82 The data of the three companies operating in the water sector that manage procurement activities independently are aggregated here with those managed centrally in order to represent overall relations with suppliers in the year under review. The figures for Berg and Demap and the photovoltaic companies (except Acea Solar and Acea Sun Capital) have not been included, as these companies recorded costs for materials and services of less than 2% of those incurred by the companies in the NFS scope.

DEALINGS WITH SUPPLIERS AND PROCUREMENT MANAGEMENT

The **Acea Code of Ethics** recalls the reference principles⁸³ that should guide **relations between Acea**, as a contracting authority, **and its suppliers** (contractors and subcontractors):

- compliance with **rules and procedures**, including processes of due diligence aimed at assessing any **risks of corruption**;
- the principles of **transparency** and **protection of competition**;
- principles of **good faith, loyalty, professional propriety**;
- **promotion of ethical and sustainability aspects**, such as respect for the protection and safety conditions of workers, the quality of goods and services, respect for the environment and the pursuit of energy savings.

Suppliers issue a **declaration of acceptance and commitment to comply with the prescriptions contained in the Code of Ethics**, attached to the documents produced **for participation in tender procedures for the awarding of works, goods and services**. Any violation of the principles contained therein revealed by audits will result in **the exclusion from the tender or cancellation of the award**. **Acea mainly uses tenders⁸⁴ to select suppliers**, adopting criteria of transparency: in 2021, **61% of procurement, managed at a centralised level⁸⁵, was awarded through a tender procedure**.

For centrally-managed Group companies, the Purchases and Logistics Function has **published on the website⁸⁶** – “Supplier” Area – **the documentation relating to purchases** regulated by the Public Procurement Code⁸⁷. **Operators who are interested in participating in tenders** can **freely access the portal of the Qualification Systems** and the portal for **participation in online calls for tenders**. The **web portal** is based on the same operational procedure as traditional tenders: it checks the adequacy of the supporting document, acknowledges possession of the eligibility requirements, discloses the bids and displays the ranking. Companies that manage their own procurement process also carry out tenders electronically and interact remotely with suppliers; this method helps to limit face-to-face meetings, in compliance with the provisions aimed at limiting the spread of the pandemic.

The Administration, Finance and Control Function **monitors supplier payment times**: in 2021, for the companies in the scope⁸⁸, the **average payment delay was 27.3 days⁸⁹** (a marked decrease compared to the 42 days recorded in 2020); the same figure, weighted in light of the amounts, falls to 22.6 days⁹⁰. This was the case for 26% of the value of payments made in the year (compared to 35% in 2020), while **the percentage of amounts paid on time was 74%, an improvement** on the 65% recorded in 2020.

WATER CONTRACTS: A DEDICATED CHANNEL ON PROCUREMENT WAS ACTIVATED AND SAFETY MEASURES AGAINST COVID-19 HAVE CONTINUED

Acea Group promotes, towards stakeholders, transparency and accuracy of information and maximum attention to the issues of safety at work, with specific regard to the personnel of contractors. In this sense, in line with the provisions of the applied NCBA, the Company confirms its interest in the **fair application of the social clause** on the subject of contract changes, aimed at the maximum **protection of workers' employment**, combating irregular forms of work or work that does not comply with the applied NCBA. On the basis of the commitments shared in the Water Contracts Protocol, during 2021 **several meetings were held with the trade unions** involved in water contracts and the **contractors** on key is-

ssues such as health and safety at work, compliance with the contractual regulations applied, and protection of employment; Acea has expressed its willingness to make available to the trade unions **a dedicated channel** (a certified e-mail address), which has been activated, through which to convey any specific reports on the subject of water contracts.

It should be noted that in 2020 an **"Advisory Committee to analyse and propose actions to improve safety at construction sites"** was set up in accordance with the "Shared protocol for the regulation of measures to combat and contain the spread of the Covid-19 virus at the workplace", with provision for periodic meetings as necessary.

83 Acea's *Code of Ethics*, approved by the Board of Directors, is shared on the company's intranet and is available online at www.gruppo.acea.it, in the Governance section. The Code devotes article 15 to suppliers, as well as numerous other references in the text. Particular attention is paid to social safeguards in higher-risk contexts: "In supply contracts with at-risk countries, defined as such by recognised organizations, contractual clauses have been introduced that involve: compliance of the supplier with specific social obligations (e.g. measures that guarantee employees respect for their fundamental rights, the principles of equal treatment and non-discrimination, protection against child labour)" (*Code of Ethics*, Art 15.2).

84 Acea issues tender procedures for the procurement of works, goods and services in compliance with current legislation (Legislative Decree no. 50/2016), with reference to the ordinary and special water and energy sectors. In particular, for tenders in special areas involving amounts below the EU threshold, Acea applies Internal Regulations consistent with the principles of the EU Treaty for the protection of competition. Finally, for tenders that do not fall within the scope of application of the *Code on public contracts* (so-called "extraneous or private law"), selection procedures are used which comply with the principles of free competition, equal treatment, non-discrimination, transparency and proportionality.

85 Equal to 86.4% of the total volumes of the companies in the NFS scope, including those not managed centrally.

86 In compliance with the requirements of the National Anti-Corruption Authority (ANAC) and the so-called "Anti-Corruption Law" (Law 190/2012).

87 Legislative Decree no. 50 of 18 April 2016 and subsequent amendments and additions. *Public Contracts Code*.

88 The 2021 analysis produced by Administration, Finance and Control also included the companies GORI, AdF and Gesesa, which have provided data even though they are not managed at the centralised level. However, the companies Berg and Demap and some photovoltaic companies are not included, due to the low incidence of costs incurred.

89 The calculation of the figure is a simple average of the difference between the due date of the invoice in the system and the date of actual payment.

90 The calculation of the figure is the result of the average of the difference between the expiry date of the bill in the system and the date of actual payment weighted according to the amount of the bills.

DISPUTES WITH SUPPLIERS 2021

The disputes⁹¹ between the company and its suppliers mainly concern non-payment of invoices and judgements on procurement matters. With regard to **non-payment of invoices** for supplies of goods, services and works, there has been a decrease in the number of disputes that have arisen: **8** in 2021 (12 in 2020). These are injunctions concerning invoices that were not paid for reasons of a formal nature and are quickly resolved by settlement proceedings. For the remaining civil litigation in the field of **procurement contracts**, mainly concerning the registration of reservations by contractors, contract terminations and damages, **14** cases were filed in **2021**, a slight increase compared to the previous year (8 cases).

As at 31 December 2021, there was a **total number of pending disputes with suppliers** (including disputes started in previous years) **of 100**, down from the 2020 figure (137 disputes), although there is still a slowdown in activity in relation to the health emergency. Lastly, **20 administrative disputes** began in 2021 (15 the previous year) concerning **tenders**. It should also be noted that, as of 31 December 2021, there were also **27 pending disputes started by employees of contractors**, who are appealing against the latter and against the contracting authority - as jointly and severally liable - for work credits accrued as an employee of the contractor during the duration of the contract.

SUSTAINABILITY CRITERIA IN TENDERS

In 2021, for the Group Companies under analysis, **over 6,480 orders/contracts** were processed, for a total of **more than 2,870 suppliers** involved (please see the *Order Analysis* below).

Within the **centralised management of tenders**, which covers 86.4% of the total value of procurement within the 2021 scope of consolidation, amounting to over 3,400 orders/contracts managed and more than 1,780 suppliers involved, as a requirement for participation, for **100% of tenders for the award of works contracts** and for numerous contracts for the purchase of goods and services, Acea requires **UNI EN ISO 9001 quality management system and the UNI ISO 45001:2018 occupational health and safety certifications**. Furthermore, for the **149 product categories subject to tender** and relating to the purchase of goods, services or works, **evaluation criteria of the technical offer based on the following systems are included during the tender process, when applicable: UNI EN ISO 14001 - UNI CEI EN ISO 50001 - UNI ISO 37001 - FSC Chain of Custody**.

Beginning in 2020, these requirements were added to potentially eligible calls for tenders, awarded on the basis of the most economically advantageous offer. In 2021 approximately 23% of the 400 potentially eligible contracts concluded⁹², were awarded on the basis of sustainability criteria. Specifically, for some tenders for water, electrical and civil engineering works awarded with the method indicated, rewarding criteria were also included regarding the use of **ecological vehicles, additional training of workers in the area of safety**, and the possession of **certifications** (where not already participation requirements) in the following areas: **environment, health/safety, energy efficiency, the use of environmentally sustainable materials and corruption**. Finally, the technical specifications for procurement by Group Companies include sustainability criteria concerning **materials**, such as recycling, re-usage and the reparability index.

For an electromechanical tender that took place in 2021, Gesesa (among the companies that are not centrally managed) added UNI EN ISO 9001 and UNI CEI EN ISO 50001 certifications as a special requirement.

Acea will include, where relevant, the normative references to the **Minimum Environmental Criteria (CAM)** adopted by Decree of the Ministry for the Environment, Land and Sea Binding parameters or bonuses in tender documents⁹³. In particular, the reference to CAMS was applied in tenders related to the rental services for generators, ordinary and extraordinary maintenance contracts for lifting systems, the purchase of computers and printer cartridges, in addition to categories such as paper, office furnishings, public lighting – supply and design of LED lighting fixtures – work clothes, cleaning of buildings, maintenance of green areas and vehicles.

ANALYSIS OF PROCUREMENTS AND THE SUPPLY CHAIN

SCOPE

The information and data presented in the paragraph in an aggregated manner concern all companies included in the scope – please see *Disclosing Sustainability: Methodological note* - including the three companies operating in the water sector, Gesesa, GORI and AdF, which are not managed centrally, and excluding Berg, Demap and some FTV companies, which together account for less than 2% of the costs of materials and services of the companies in the consolidation area.

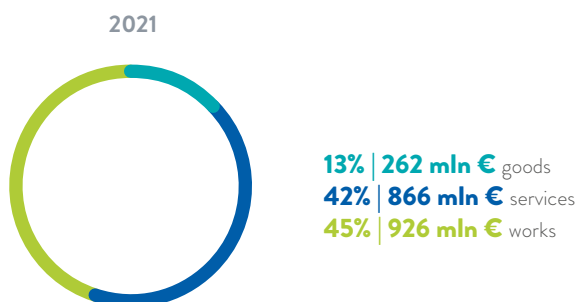
The **2021 tenders** for the procurement of **goods**, the provision of **services** and the execution of **works**, had a **total economic total economic value**, as initially mentioned, of more than **€ 2 billion**⁹⁴, with a marked increase compared to 2020 (around € 1.2 billion). In absolute terms, the largest increase in amounts compared to the previous year was recorded for the item work (129%), followed by services (60%), while the item goods decreased somewhat (-12%) (see Table no. 36).

⁹¹ The figures for the 2021 dispute refer to all the Companies within the NFS scope (see *Disclosing Sustainability: Methodological Note*).

⁹² Consultancy activities are excluded from this calculation.

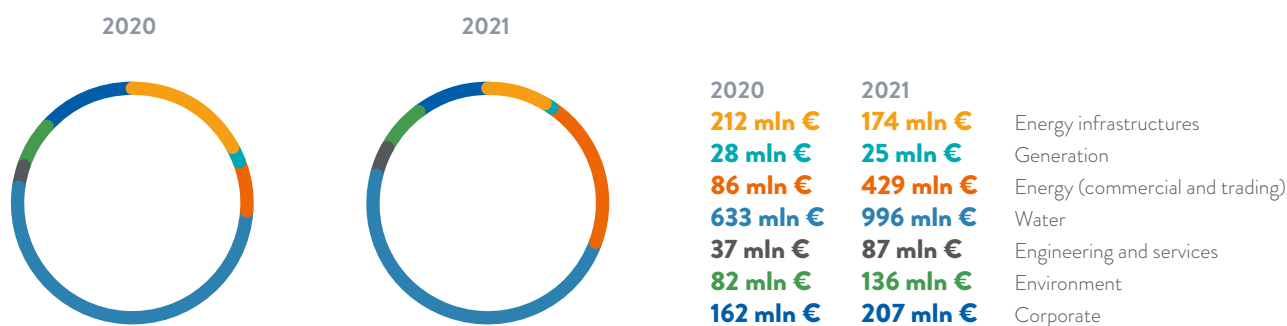
⁹³ From the www.minambiente.it website: “Minimum Environmental Criteria (CAM) are the environmental requirements defined for the various phases of the purchasing process, aimed at identifying the best design solution, product or service from an environmental point of view throughout the life cycle, taking into account market availability. [...] Their systematic and uniform application makes it possible to spread environmental technologies and environmentally preferable products”.

⁹⁴ The amount of purchases managed at the centralised level refers to tenders awarded during the year, without any distinction between investments and operating cost, annual and multi-annual contracts. Purchases of commodities, regularisation orders and intercompany orders are excluded. The figures for the three water companies that are not centrally managed, for a total of € 278 million, do include all purchase types.

Chart no. 34 – Value of ordered goods, services and works and percentage on total (2021)

NOTE: Figures are rounded off to the nearest unit.

Observing the **value of procurement** for the **business macro-areas** - Networks Operations (electricity grids), Generation, Commercial, Water Operations, Engineering Operations, Environment Operations (waste-to-energy and environmental services) and Corporate (waste to energy and environmental services) and Corporate (Acea SpA) - the increase in the value of orders for both works and goods and services was concentrated in the Commercial area, which also provides energy efficiency services for buildings, and in the Water area (see chart 35 and table 36).

Chart no. 35 – Orders (goods, services, works) by business area (2020-2021)

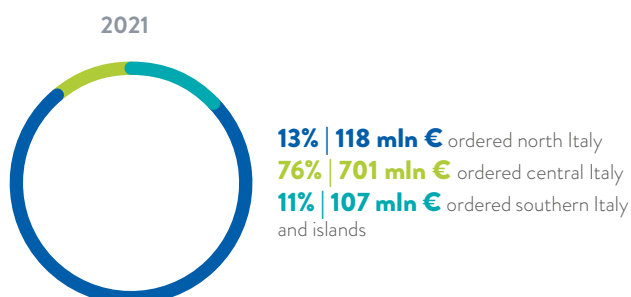
NOTE: Figures are rounded off to the nearest unit. The **Energy Infrastructure segment** includes the company Areti, the **Generation segment** includes the companies Acea Produzione, Ecogena and FTV (Acea Solar and Acea Sun Capital). **Energy (Commercial and Trading)** includes Acea Energia, Acea8cento (until July 2020) and Acea Innovation. **Water** includes the companies: Acea Ato 2, Acea Ato 5, GORI, Gesesa, AdF. **Engineering and Services** includes Acea Elabori. **Environment** includes: Acea Ambiente, Aquaser and Acque industriali. Present in the **Corporate** segment is only Acea SpA.

As already mentioned, the procurement needs of the Group's companies included in the scope of consolidation in the year totalled **6,482 orders/contracts** and involved **2,869 suppliers** (13% more than the 2,529 in 2020). **In terms of the geographic distribution of the suppliers**, in 2021, most suppliers (48%) were in central Italy, of which 31% in Lazio, followed by northern Italy (31%), southern Italy and the islands (19%) and only 2% were foreign. The **geographical distribution of the value of the procurements among the mac-**

ro-regions, in terms of percentage weight on the total amounts (€ 1,128 million for goods and services and € 926 million for works), is more concentrated in central Italy, with 51% of the item "goods and services" and 76% of the item "works", followed by northern Italy, which absorbs 38% of the item "goods and services" and 13% of the item "works". During the year, 38% of the value of "goods and services" and **59% of the value of "works"** were concentrated in **Lazio** (Graphs nos. 36 and 37 and Table no. 37).

Chart no. 36 – Geographical distribution of the amounts for goods and services in Italy and abroad (2021)

NOTE: Figures are rounded off to the nearest unit.

Chart no. 37 – Geographical distribution of the amounts of works awarded in Italy (2021)

NOTE: Figures are rounded off to the nearest unit. In 2021, for the companies in the scope, the value of foreign procurement was zero.

Table no. 36 – Procurement data (2020-2021)

| | u. m. | 2020 | 2021 | Δ% 2021/2020 |
|--|------------------|--------------|--------------|--------------|
| VALUE OF PROCUREMENT THROUGH TENDERS | | | | |
| goods | million € | 297 | 262 | -12% |
| services | million € | 540 | 866 | 60% |
| works | million € | 404 | 926 | 129% |
| total | million € | 1,241 | 2,054 | 66% |
| GOODS, SERVICES AND WORKS AS A PERCENTAGE OF TOTAL ORDERS | | | | |
| goods | % | 24% | 13% | -46% |
| services | % | 44% | 42% | -4% |
| works | % | 33% | 45% | 39% |
| VALUE OF ORDERS BY BUSINESS AREA | | | | |
| Energy Infrastructure | million € | 212 | 174 | -18% |
| Generation | million € | 28 | 25 | -13% |
| Energy (commercial and trading) | million € | 86 | 429 | 401% |
| Water | million € | 633 | 996 | 57% |
| Engineering and services | million € | 37 | 87 | 136% |
| Environment | million € | 82 | 136 | 66% |
| Corporate | million € | 162 | 207 | 28% |
| NUMBER OF PURCHASE ORDERS MANAGED | | | | |
| POs for goods, services and works | no. | 6,552 | 6,482 | -1% |

NOTE: all the figures in the table are rounded off to the nearest unit.

Table no. 37 – Procurement nationwide (2020-2021)

| | u. m. | 2020 | as % of total | 2021 | as % of total |
|--|------------------|--------------|---------------|--------------|---------------|
| NUMBER OF SUPPLIERS OF GOODS, SERVICES AND WORKS NATIONWIDE | | | | | |
| suppliers north Italy | no. | 819 | 33% | 893 | 31% |
| suppliers central Italy | no. | 1147 | 45% | 1,366 | 48% |
| suppliers Lazio | no. | 757 | 30% | 897 | 31% |
| suppliers south Italy and islands | no. | 516 | 20% | 556 | 19% |
| foreign suppliers | no. | 47 | 2% | 54 | 2% |
| total suppliers | no. | 2,529 | 100% | 2,869 | 100% |
| GEOGRAPHICAL BREAKDOWN OF AMOUNTS FOR GOODS AND SERVICES | | | | | |
| value of orders from Northern Italy | million € | 365 | 43% | 426 | 38% |
| value of orders from Central Italy | million € | 375 | 45% | 575 | 51% |
| value of orders from Lazio | million € | 252 | 30% | 426 | 38% |
| value of orders from southern Italy and islands | million € | 75 | 9% | 117 | 10% |
| value of orders abroad | million € | 22 | 3% | 10 | 1% |
| total value of orders for goods and services | million € | 837 | 100% | 1,128 | 100% |
| GEOGRAPHICAL BREAKDOWN OF AMOUNTS FOR WORKS | | | | | |
| value of orders from Northern Italy | million € | 133 | 33% | 118 | 13% |
| value of orders from Central Italy | million € | 195 | 48% | 701 | 76% |
| value of orders from Lazio | million € | 177 | 44% | 546 | 59% |
| value of orders from southern Italy and islands | million € | 68 | 17% | 107 | 11% |
| value of orders abroad | million € | 8 | 2% | 0 | 0% |
| total ordered for works | million € | 404 | 100% | 926 | 100% |

NOTE: all the figures in the table are rounded off to the nearest unit. The “northern Italy” geographical area includes Valle d’Aosta, Piedmont, Lombardy, Veneto, Trentino-Alto Adige, Friuli-Venezia Giulia, Emilia-Romagna and Liguria; “central Italy” includes Tuscany, Umbria, Marche, Latium, Abruzzo and Molise; “southern Italy and islands” includes Campania, Basilicata, Apulia, Calabria, Sicily and Sardinia. The geographical area “abroad” includes suppliers that are mainly European.

SUSTAINABILITY IN THE SELECTION AND ASSESSMENT OF SUPPLIERS: FROM QUALIFICATION TO ONGOING CONTRACTS

Various **systems for qualifying suppliers of works, goods and services** are active in Acea, in observance of principles of competition and equal treatment.

The **Supplier Qualification Unit**:

- coordinates working groups to identify the **qualification requirements**;
- draws up the **Qualification Regulations**;
- establishes **Qualification systems** of European significance⁹⁵ and **Supplier Lists** for so-called “below threshold” or private contracts.

During 2021, the product tree shared between the Group companies whose procurement is managed centrally included **544 product groups** and the Unit in charge managed, as of 31/12/2021, **159 Supplier lists**.

To register with the **Lists/qualification systems**, companies must visit the Acea institutional website (www.gruppo.acea.it suppliers section) which is a dedicated portal; the requests are processed, including verification of the possession of the requirements and related communications to the supplier. During 2021, a **total of 934 applications** for registration in the **Qualification Systems/Lists** were processed (+17% compared to the 798 applications in 2020), amounting to **733 successful applications** in total. Specifically:

- **274** qualification applications processed for “works” Qualification systems”;
- **459** qualification applications processed for Qualification Systems/Suppliers’ Lists for “goods and services”.

The **qualification requirements** requested of suppliers to register on the Qualification System are “**standard**” – these include **requirements of a moral nature envisaged by the laws in force** in the sector – and “**specific**”, i.e. they refer to the product group or groups included in each Supplier List.

Among the specific requirements, in some cases **Acea requires its potential suppliers** to have **certain Authorisations and/or certifications**:

- **UNI EN ISO 9001 certification** (binding requirement for all the “works” product groups and for almost all the “goods and services” suppliers);
- **UNI EN ISO 14001 certification** (for inclusion in the lists of suppliers for special non-hazardous waste, cleaning services, armed surveillance service and concierge/reception);
- **Registration with the National Environmental Operators’ Register** or authorisation to manage a plant for the recovery/disposal of waste (for inclusion in suppliers’ lists for Waste Management Systems);
- **OHSAS 18001/UNI ISO 45001 certification** (for inclusion in the suppliers’ list for the electro-mechanical maintenance of industrial plants and cleaning services);
- **UNI EN 15838:2010 certification** (for inclusion in the suppliers’ list for “Call Centre and Back Office”);
- **SA8000 certification** (for inclusion in the suppliers’ list for “Cleaning services”);
- **UNI 10891 certification** (for inclusion in the suppliers’ list in the “Armed surveillance service and concierge/reception”).

For admission to the Qualification Systems of Community-wide significance, **companies wishing to qualify must declare their availability to undergo an audit at the administrative head office**, aimed at assessing the truthfulness and adequacy of the documentation provided, **and at the operating plants** or product warehouses, in order to assess the implementation and application of the active management systems.

The **assessment of suppliers** involves different types of controls that are implemented **depending on the List and the different statuses that the supplier acquires** with respect to Acea:

- **during the qualification phase**;
- **qualified**;
- **qualified with contract in progress**.

In order to be able to register on the **suppliers’ list** relating to the **Single Regulations for Goods and Services and Works** which, for 2021, concerned **114 out of 159 total Suppliers’ Lists** (“qualification phase”), suppliers must complete a **self-assessment questionnaire on the Quality, Environment, Safety, Energy and Social Responsibility management systems** that are considered **important for sustainability** on the Vendor Management platform. In 2021, this questionnaire was completed by **386 suppliers** (243 for goods and services and 143 for works), an increase of 6% compared to 363 in 2020, representing 100% of the qualified suppliers on the supplier lists for the aforementioned Single Regulations and over **80% of the total qualified suppliers in the year** (equal to 481)⁹⁶.

Furthermore, in continuity with a practice that has been consolidated for several years, **Purchasing and Logistics**, in synergy with the Sustainability Planning & Reporting Unit, sent a panel of **100 Group suppliers** (79 in 2020) an **in-depth questionnaire** to assess their commitment on **environmental issues**, with a particular focus on energy consumption. **40 companies responded to the questionnaire in full** and the results of the survey are **shown in the Relations with the environment** section, in the chapter on **The Use of Materials, Energy and Water** (Energy Consumption paragraph), to which reference is made.

AdF also applies, where relevant, **preferential sustainability criteria** upon **registration on the Suppliers’ List** and **for qualification** in the product categories, for example by requiring operators who intend to qualify in the product category “cadastral cleaning services - waste disposal” to certify that they have ISO 14001:2015 certification.

In addition, after initiating the **Circular Economy Protocol** in 2020, in 2021 AdF continued and consolidated this activity, which aims to **protect local suppliers and enhance the quality and socio-environmental sustainability of the supply chain**. The Protocol, drawn up with the direct involvement of stakeholders, including institutions, sector authorities, banks, universities, trade unions, etc., allocates part of the procurement of goods, services and works, that not subject to the rules of the Procurement Code, to local economic operators, who can register in a dedicated and specially created register to qualify in the product categories related to the circular economy. Social and environmental responsibility is also taken into account when assessing qualification requests, and incentive criteria that are linked to further commitments are envisaged, such as, for example, hiring staff belonging to protected categories, good practices in terms of health and safety in the workplace, use of vehicles with

⁹⁵ Pursuant to Article 134 of Legislative Decree no. 50/2016 as amended.

⁹⁶ The number of qualified suppliers does not coincide with the 733 successfully processed applications for registration in qualification systems, as suppliers can register in more than one qualification system.

low environmental impact, etc. (see the Circular Economy Regulation available in the "Suppliers Area" of the institutional website www.fiora.it). In 2021, in particular, **AdF wished to promote awareness of the project** through periodic **information campaigns** and also through the **signing of agreements with the main trade associations** in the area to involve their members. As of 31/12/2021, there were **more than 100** qualified suppliers within the scope of the Protocol. Finally, in order to assess the effectiveness of the project, **AdF set up a monitoring table** to periodically check the results achieved and the quality of the actions undertaken and to share them with local stakeholders.

Once **qualified**, the supplier's headquarters may be subjected to a **second-party Audit on Quality, Environment, Safety, Energy and Social Responsibility (QASER) Management Systems** to verify the **actual application** of active certified Management Systems and the management methods of **other areas relevant to sustainability**. Again in 2021, the Covid-19 pandemic situation prevented audits being carried out at the supplier's premises, and they were partly replaced by **audits conducted on the Teams platform** and **remote sharing of documentation**, which made it possible to maintain an active relationship with the supply chain on issues of quality, environment, safety, energy and social responsibility. The **suppliers to be audited** were selected **from among the main suppliers** - based on the economic weight on the volumes of the 2020 "works" order, processed in 2021, and of a share of the 2020 "services" order including the waste management orders - **that have operated in the**

most critical sectors for "environment" and "safety" (waste management and works). In particular, **22 suppliers** or 20% (approximately 91 million) **were audited** with regards to the 2020 "works" item and the share of 'services' (a total of € 458 million).

Each supplier **was sent feedback** indicating the degree of compliance per scheme and overall, as well as a report with recommendations for improvement. Overall, it was found that 100% of the audited suppliers are certified for Quality (ISO 9001), 95% for Environment (ISO 14001); 91% for Safety (ISO 45001) and 68% for Social Responsibility (SA 8000), while only 41% have Energy certification (ISO 50001). An overall average overall **average compliance, compared to the requirements of the audited schemes (QASER), of about 83%** (86% for Quality, 85% for Environment and Safety, 64% for Energy and 83% for Social Responsibility). In addition, in the case of a supply of Granular Activated Carbon used for water purification, **Acea Ato 2** included in its purchase specifications the possibility of carrying out **audits at production plants located abroad**, including in "countries at risk". Two audits were carried out during 2021, the findings of which were shared with the supplier for the development of a recovery plan.

The **Group Vendor Rating** started in 2020, continued in 2021 and is currently in the **final fine-tuning phase**. In particular, the evaluation system will monitor **several performance indicators, including a composite sustainability indicator**, developed with the involvement of Ecovadis in the project; see box for further details on the project's progress during the year.

PROGRESS IN 2021 OF THE GROUP VENDOR RATING PROJECT AND ADOPTION OF THE ECOVADIS MODEL.

During 2021, the Group's Vendor Rating system was implemented on the dedicated module of the single purchasing portal, to analyse, assess and monitor supplier performance in order to **increase the level of competitiveness and quality of services rendered and products supplied**. The model was defined for goods, services, works and for the combined product supplier/group, using criteria that was objective (non-discretionary) and as automatic as possible. The **Vendor Rating index** is calculated on the basis of the weighted combination of detail indicators that monitor the main aspects relative to the **execution phases of the contract: punctuality, quality and safety**.

As of 31 December 2021, the index has been **calculated for 781 suppliers** for a total of **1,859 scorecards** i.e. scorecards in which, for each supplier/goods group concerned, the summary indicator and detailed indicators are shown; they are higher than the number of suppliers as some are registered in more than one goods group. Currently the **model is undergoing fine tuning**, to verify the robustness of the data and create a significant historic database. The next step is making the model official and begin applying it.

Acea recently decided to strengthen its commitment to promoting sustainability throughout the supply chain and in 2021 adopted

the **model developed by Ecovadis**, a global Corporate Social Responsibility (CSR) company offering ratings based on international standards, to **assess the sustainability performance of its partners**. The model covers the evaluation of the company services in order to calculate the **sustainability rating** according to 21 CSR criteria related to the environment, work and human rights, ethics and sustainability in purchases.

The Ecovadis model also provides for interaction with suppliers, who are carefully and individually analysed by means of a customised evaluation questionnaire, data collection and analysis by CSR experts, the **definition of corrective plans and monitoring the definition of corrective plans and monitoring** thereof and sharing of the evaluation on the Ecovadis network. In 2021, **148 suppliers were evaluated** and 102 are currently being assessed, with an **average score of 59.2/100**.

Once fully deployed, the CSR evaluation **will be used as a bonus criteria in tenders**, assigning different scores based on the rating obtained from the Ecovadis assessment, in order to reward the most virtuous companies in terms of environmental protection and corporate social responsibility.

HEALTH AND SAFETY ALONG THE SUPPLY CHAIN: AWARENESS RAISING AND AUDITS

The Group is **extremely attentive to occupational safety**, which it also applies **across the supply chain**. In particular, Acea has tasked organisational structures, in the parent company and the operating companies, with activities aimed at **monitoring** and more effectively **controlling** how suppliers manage safety.

The **Site Safety Unit in Acea Elabori**, is the Group structure of reference, for the management of the **safety of works and services contracted out** by Group companies (mainly Acea Ato 2, Acea Ato 5, Areti and Acea Ambiente⁹⁷), **ensuring compliance with the highest standards** and with regulations⁹⁸. To this end:

- **Support and assistance to the Works Manager** and general Safety Coordination;
- **Coordination of safety in the design phase and during execution** at specific sites;
- **Safety inspections** for works and services that do not require coordination during execution;
- **Services ancillary** to safety inspection activities.

Site safety inspections are mainly related to the **main works** that are the subject of **maintenance contracts for networks and services in the water and electricity sectors**, but also concern minor contracts⁹⁹.

Activities are distinguished into works requiring **Safety Coordination during the Execution phase** (Coordinators appointed as needed by the Works Director) and works with **random safety inspections**.

To facilitate the operation of the organisational structure, **inspection activities are managed with computerised systems that issue work orders to the security inspectors to check ratings that exceed a certain threshold**. The system also provides support for technical and professional suitability checks and the engagement of a Safety

Coordinator at the execution or design stage, where required.

For the interventions carried out during the year the following people were involved:

- **21 Safety coordinators** in the execution and design phase, assigned to specific worksites as needed;
- **19 Safety inspectors**, who assessed and verified the safety standard through random inspections;
- **5 Planners**, who followed the planning and dispatching of the safety inspections to the sites of the contractors;
- **10 Technical Support resources**, who managed the technical and professional audits of the companies engaged in the contracts.

In particular, in **2021**, the Site Safety Unit:

- carried out the activities in **support of the technical and professional audits of 812 companies** (45% of contractors and 55% of subcontractors and operated equipment rentals¹⁰⁰), about **32% more** than in 2020 (617 companies);
- activated **Safety Coordination in the Execution phase for 492 tasks** and carried out **Safety Coordination in the Design phase for 54 tasks**;
- conducted **15,444 on-site safety¹⁰¹ inspections** (+3.6% compared to 14,904 inspections in 2020).

During the audit of the staff of contractor and subcontractor companies, the Site Safety Unit **also ascertains that the Employer has provided basic health and safety training** and, where applicable, specific training.

After the **occupational health and safety audits** conducted during inspections **by the Site Safety Unit** inspections, a total of **a total of 1,023 non-conformities¹⁰²** (of which 677 were of minor importance, 251 of medium importance and 95 were of major importance), **confirming**, despite the constant increase in inspection visits, **the considerably decreasing trend recorded over the last three years¹⁰³** both in the absolute number of non-conformities detected and, above all, in the number of non-conformities in the "major" category.

THE FIRST "PILOT" OF THE SAFETY CHECK PROJECT

In 2021, Acea Elabori, in collaboration with the parent company's Technology & Solutions department, continued testing on the Safety Check project, which was launched in 2020. The objective is to remotely verify the safety conditions of personnel at construction sites, through the use of IoT sensors in the field. In particular, **the pilot carried out in 2021** was of a **4 month duration** and was conducted at one of the construction sites managed by the Works Management and Safety department. Sensors, tags, smart-watches and an IoT infrastructure linked to a

dashboard enabled **real time monitoring of worker safety on site, to prevent potential risk situations**. Five operational technicians were involved in the monitoring and the system received about 1,200 inputs from the field, most of which were the result of deliberate **specifically staged simulations** to test the effective operation of the system, such as cases where the protective helmet was removed in areas where it should have been worn.

The pilot was successful and preparatory activities for a gradual implementation of the project have begun.

97 For Acea Ambiente, Acea Elabori's Construction Site Safety Unit has mainly carried out Safety Coordination during execution (CSE) activities on a smaller number of sites.

98 Legislative Decree no. 81/08 "Consolidated Act on Safety", as amended.

99 Such as electrical or electromechanical maintenance work carried out on plants, meter changes, road repairs, video-inspections and sewerage pumping, etc.

100 Operated equipment rental is a contract that involves the rental of work equipment and the performance of a specialized operator, essential for the operation/use of the equipment itself.

101 The number includes visits for all types of contracts, both main ones and "minor ones".

102 For the main contracts, as envisaged in the contract documentation, the results of audits are recorded according to four categories: compliant or non-applicable, minor (generally corrected on the spot), medium and major infractions. The non-conformities are associated with corrective actions and penalties applied by the contracting company on the basis of the provisions of the tender documentation, and, serious infractions may lead to the suspension of works.

103 In 2019, after approximately 12,400 inspections, 1,741 non-conformities were recorded (1,141 minor, 367 medium and 233 major) and in 2020, after 14,904 inspections, 1,457 non-conformities were recorded (962 minor, 337 medium and 158 major).

The **Acea Elabari Site Safety Unit** and all **Group Companies** that independently manage site audits, either in whole or in part, also contribute to **protecting the safety of contractors working on the construction sites**, by meeting the employers of the companies before the start of work to **inform them of the standards adopted**. In fact, **all contractors** are informed by the relevant Units in charge of managing the contract, the Works Management and the relevant Safety Coordinators for the Execution of the Works (the latter where provided for by current legislation), **through the DUVRI** (Single Risk Assessment Document, to be attached to the contract), **the SCP** (Safety and Coordination Plan) or **specific coordination meetings**.

As an example, **AdF** which conducts its own inspections, during 2021 took steps to carry out **coordination meetings with the contracting companies** given the prolonged health emergency situation caused by Covid-19, reiterating the correct procedures to be implemented, also in view of the **repeated updates to the relevant legislation** and the need to keep site procedures and documents constantly in line with national and regional regulations.

In Acea, moreover, the **Training Camp** is a space dedicated to the training and education of staff on **occupational health and safety**. It is used for both internal training (see also Staff section) and for **training of contractors** in relation to specific activities (such as, for example, climbing/descending medium and low voltage power line poles, access to underground confined spaces, etc.), depending on the contracts awarded during the year.

In 2021, due to the continuation and development of the health emergency, the activities of the **Coronavirus Prevention Committee** set up in 2020 by the **Parent Company**, from the very early stages of the Covid-19 emergency, constantly **coordinates with Group companies and with contractors** (see also Staff - Health and safety at work). In particular, contractors **have been trained** to comply with the "Shared protocol for the regulation of measures for the prevention and containment of the spread of the Covid-19 virus in workplaces"¹⁰⁴ which requires the adoption of **technical, organisational and procedural measures** (safety measures to prevent contagion), defined on the basis of a precautionary approach, for the management of health emergencies **both in the workplace and with regard to the procurement of goods and supplies**, extending also to the site owners and all subcontractors and sub-suppliers present; an **operational instruction** containing the Covid-19 Prevention Guidelines was provided to contractors.

The Companies that carried out site inspections during the year, **above and beyond the work of the Site Safety Unit**, took the **Parent Company's guidelines into consideration**. In particular, **Acea Ato 2** increased the activities assigned to the Supervision and Inspection Unit, and **1,118 inspections** were conducted during the year. In addition, in June and July 2021, the Company dedicated two days to conducting **unannounced field surveillance activities on safety and environmental issues, respectively**, and has decided to repeat both initiatives periodically. **Acea Ato 5** also stepped up its audit activities and carried out **270 inspections** through its Internal Security Team (Risk & Compliance and Security Unit), to audit

suppliers on occupational health and safety, environmental issues and the quality of the work carried out, as well as compliance with prevention procedures for the dissemination of Covid-19, including possession of Green Certification (also known as the "Green Pass") by the workers. The findings of the inspection visits were shared with the companies concerned, to raise their awareness on the issues detected by the inspection.

This also applies to non-centrally managed companies: Through its Technical Management Systems Unit, **AdF conducted 223 audits to verify safety conditions and compliance with the Covid-19 regulations**, detecting 7 deviations concerning lack of documentation and no cases of procedural problems and/or lack of PPE; **GORI conducted 2,600 on site health and safety audits** and **Gesesa** carried out **24 inspections** at contractors' sites to check compliance with safety regulations and to identify and resolve anomalies.

The **Parent Company's Occupational Safety Unit** in turn organised **9 meetings** with technical directors and supervisors of **contractors** under contract with Acea SpA, during which it stressed the importance of **accident prevention**.

In 2020, the Investor Relations & Sustainability Department and the Occupational Safety Unit of the Parent Company, **in synergy with the parent company Units and the operating companies handling relations with suppliers** in various capacities launched a project titled "**Sustainability and safety, a virtuous pair**", which was further developed in 2021. The project aims to actively involve contractors working with Acea, urging them to conduct training sessions and in particular, **improve the process of collecting and reporting accident data**. Numerous meetings were held to this end during the year with the RSPPs of the Group companies, who are key players in the process of collecting data from contractors, in order to optimise the process, reach as many companies as possible and analyse increasingly complete data.

After the pilot survey carried out in 2020, to which 81 companies responded, **in 2021** all the Companies asked the companies that provided the main services during the year to complete questionnaires on the subject of safety in order to ascertain the level of internal control each company has and what accidents have occurred. **225 contractors responded** to the survey.

Analysis of the data showed that total of 31 accidents occurred in 2021, broken down into **occupational and non-occupational accidents**. Of these, 25 **professional accidents** occurred in the year to **contractor personnel working on Acea jobs**, of which **7 for work-related travel** and almost all (21) involving only minor personal injuries.

There were **6 non-occupational accidents**, 5 of which involved minor injuries.

The **main causes of accidents** are due to **stumbling, bumping, slipping and road accidents**. The **frequency index** of total accidents is **12.44** and the **severity index** is **0.38**. There were no fatal accidents. Lastly, **no cases of occupational diseases** were recorded for contractors' staff during the year.

With a view to continuous improvement, analyses are under way to **identify the actions to be taken in order to standardise the process and involve as many of the Group's suppliers as possible**.

¹⁰⁴ The Shared Protocol regulating measures to combat and contain the spread of the Covid-19 virus in workplaces was signed on 14 March 2020 by the trade unions and employers' organisations in agreement with the Government. It was further supplemented on 24 April 2020 and updated with the Protocol of 6 April 2021, for the duration of the emergency.

INVOLVEMENT OF SUPPLIERS IN OTHER SENSITIVE ISSUES

Some Group companies carry out activities from **involvement and awareness of suppliers** with respect to other aspects mainly concerning technological developments implemented in operating processes and Group guidelines, to ensure **constant alignment and adequate training of partners** working on behalf of the Company. In 2021, **Areti** involved suppliers on the topics of 'mass replacement of 2G measuring units' and 'commercial quality and 2G metering' **providing 40 operators from the contracting companies** with a total of **560 hours of training** divided into 5 training sessions. In addition, **8 contractor operators** in the field of "Hammer meter readers - time meters received **8 hours of training**. The initiatives were carried out with the help of the supplier and 8 internal teachers, in full compliance with the anti-Covid-19 provisions for in-person

training. The training venues were the Magliana training room and the "Cabin of the Future", a real electrical cabin specially set up for technical-operational training featuring some equipment and interactive panels.

Finally, every year **Acea Energia** monitors the **quality of the sales service provided by the door-to-door and/or telemarketing agencies** in the "domestic" and "micro-business" segments of the de-regulated market, and in accordance with the Agency Mandate, **it trains those** who work in the name and on the behalf of Acea **so that they can convey adequate information** to customers (please also see the chapter on Customers). In 2021, Acea Energia notably carried out a **training programme**, providing **927 hours of training** in total, of which 427 hours were delivered to **551 door-to-door sellers**, for a total of 63 days, and 500 hours delivered to **teleselling agency workers**.

STAFF

ACEA'S EMPLOYEES



people with a permanent contract:
98%



women on the Acea Board of Directors :
44.4%



335 hires: **84%** with permanent contracts and **39%** young people under 30

In 2021, the **company's total staff**¹⁰⁵ numbered **6,466 people**.

Table no. 38 – Evolution of employees by macro-area (2019-2021)

| business area | 2019 (no. of employees) | 2020 (no. of employees) | 2021 (no. of employees) |
|---------------------------------|-------------------------|-------------------------|-------------------------|
| Water | 2,695 | 3,303 | 3,353 |
| Energy Infrastructure | 1,272 | 1,280 | 1,264 |
| Generation | 81 | 87 | 89 |
| Energy (Commercial and Trading) | 437 | 392 | 397 |
| Environment | 304 | 338 | 362 |
| Engineering and Services | 262 | 274 | 298 |
| Corporate (Acea SpA) | 665 | 700 | 703 |
| total | 5,716 | 6,374 | 6,466 |

(*) 2021 figures do not include the staff of Berg and Demap, totalling 33 people.

¹⁰⁵ This chapter shows the data of the companies in the NFS scope (see *Communicating sustainability: methodological note*), with the exception of the companies in the FV area that have no staff, and the companies Berg and Demap, which are not managed centrally and have a low impact, as indicated in the text. The total workforce, for all the Companies within the consolidation, was 9,348 during the year (7,650 in 2020).

The Water Operations segment recorded the **highest numbers and accounts with 52% of the total**, in line with the number of Companies included and the percentage of business on the Group's operations. The **Energy Infrastructures** segment followed, which **represents 20% of the total figures**.

Except for the paragraph Protection of health and safety at work, the information and data set out below in the chapter do not include Berg and Demap, for which it was not possible to collect and process information at the closing date. However, as these companies are small, the number of employees is not very significant and does not change the data illustrating the overall characteristics of the Group's workforce.

COMPOSITION AND TURNOVER

The Acea SpA Human Resources Management Department handles the **administration of the personnel** employed by the subsidiaries according to defined procedures. To this end, the Department

uses computer systems (SAP HCM, SIPERT PY, Success Factor) operating at the Group level for the **management of employee records, salaries, merit plans**.

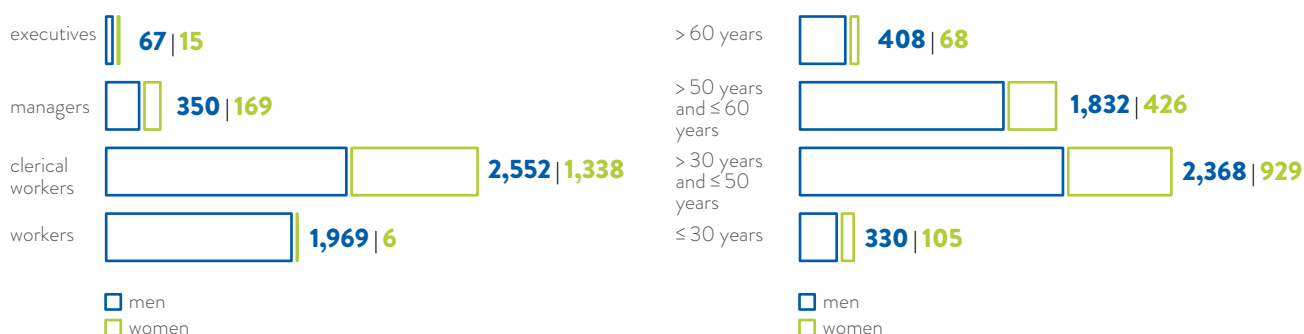
In terms of composition, **76% of the total staff consists of men**. This is caused by the fact that there are more men than women with technical skills in Italy today.

The **professional structure is stable** and is composed as follows: **60% are employees, 31% are workers, 8% are executives and 1% are managers**.

7% of the workforce less than 30 years old, 51% is between 30 and 50 years old and 42% of people are over 50 years old.

With regard to the **level of education**, we confirm the **steady increase of university graduates, who have increased to 27% of the total** (25% in 2020) and the **stability of diploma holders**, whose percentage remains around **50%** (for the above data, please see Chart no. 38 and Table no. 39).

Chart no. 38 – Composition of the staff: gender, age and category (2021)



98% of the workforce are employed with a **permanent contract**, which is in line with 2020. The **length of the employment relationship** indicates the **stability of employment**: **47% of the people who**

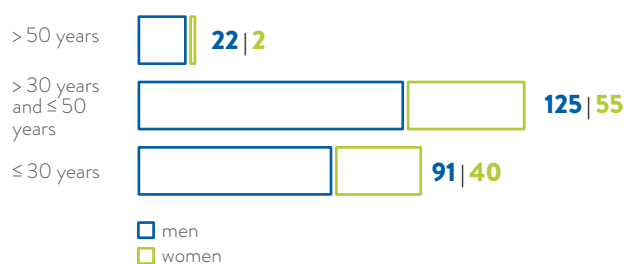
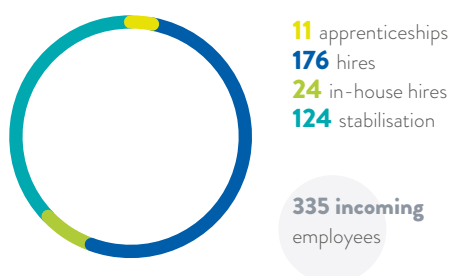
left during the year worked for the Group for 30 to 50 years and 53% up to 30 years (please see Chart no. 39 and Table nos. 39 and 41).

Chart no. 39 – Contract types and length of the employment relationship (2021)



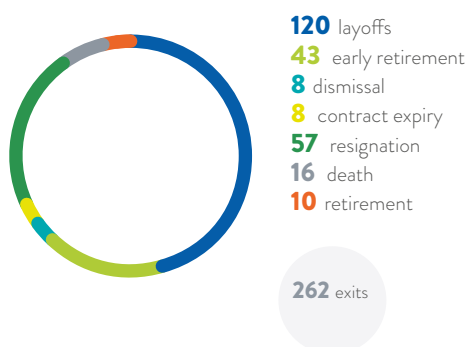
335 people joined the company in 2021 (238 men and 97 women), **84% of whom on the basis of open-ended contracts** divided into: 176 recruitments from the external labour market, 124 became permanent employees (including 21 young people who did internships

or apprenticeships in the company), 24 were hired internally and 11 were granted apprenticeships (see chart no. 40 and table no. 41). **39% of newly hired staff** during the year were **aged 30 or under**.

CHART NO. 40 – Types of entries and age of the staff (2021)

262 people left the company in 2021 (218 men and 44 women): 120 with a form of voluntary and incentivised early retirement, 43 as part of voluntary redundancy plans, with the agreed and incentivised termination of the employment contract, 10 retired, 57

resigned, 16 passed away, 8 had their contract expired and 8 were dismissed (see Chart no. 41 and Tables no. 41 and 42). **81% of the outgoing staff was over 50 years of age.**

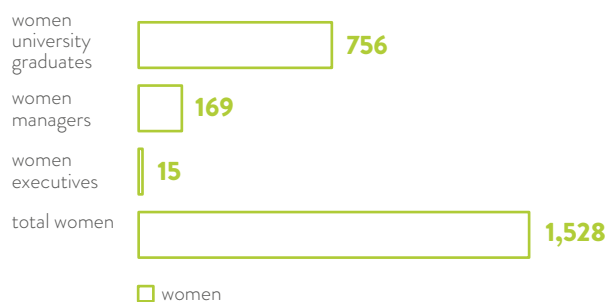
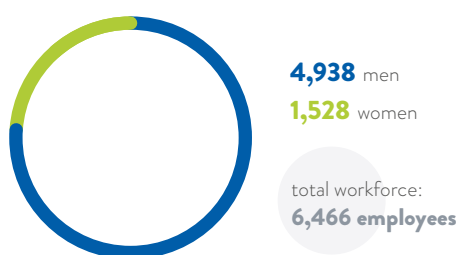
Chart no. 41 – Types of exits and age of the staff (2021)

The **rate of turnover** was **9.2%** (9.21% for men and 9.16% for women), the **incoming rate** was **5.17%** (4.8% for men and 6.35% for women) and the **outgoing rate** was **4.04%** (4.41% for men and 2.81% for women) (see Table no. 40).

THE PRESENCE OF WOMEN IN ACEA

In 2021, Acea had **1,528** female workers (up 28% from 1,486 in 2020), representing **24% of the total workforce**.

The proportion of female executives as a percentage of total executives (15 out of 82) is equal to **18%**. **The percentage of women in managerial positions** is **33%** of the category (169 out of 519) (Chart no. 42, while **women accounted for 44%** (765 out of 1,741) of the **graduates** employed by the Group.

Chart no. 42 – Distribution of staff by gender (2021)

A total of 61 women participate in the **corporate governance of the reporting companies** (Boards of Directors, Boards of Statutory Auditors and Supervisory Bodies), representing **34% of the total members** (in 2020, women in the governance bodies totalled 60, equal to 35%). In the Parent Company, **women** make up for **44.4%** of the members sitting on the **Board of Directors** (4 women out of 9 members) and **60%** of the members of the **Board of Auditors** (3 women out

of 5 members, including 2 alternates), thus the company has exceeded the quotas imposed by legislation (Law 120/2011). We also report that every internal board committee includes one or more women, and that the Chair of the Control and Risks, Appointments and Remuneration, Ethics and Sustainability Committees is assigned to a female Director (see also *Corporate Identity*, section Corporate governance in Acea).

Chart no. 43 – Presence of women in the corporate governance bodies (2019-2021)

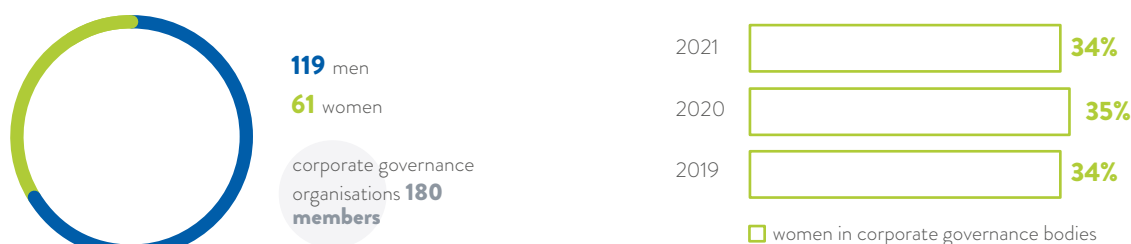


Table no. 39 – General personnel information (2019-2021)

| u.m. | 2019 | | | 2020 | | | 2021 | | |
|---|--------------|--------------|--------------|--------------|--------------|--------------|--------------|--------------|--------------|
| | men | women | total | men | women | total | men | women | total |
| COMPOSITION of the staff | | | | | | | | | |
| number | | | | | | | | | |
| executives | 70 | 11 | 81 | 73 | 17 | 90 | 67 | 15 | 82 |
| managers | 311 | 137 | 448 | 341 | 150 | 491 | 350 | 169 | 519 |
| clerical workers | 2,293 | 1,133 | 3,426 | 2,517 | 1,295 | 3,812 | 2,552 | 1,338 | 3,890 |
| workers | 1,756 | 5 | 1,761 | 1,975 | 6 | 1,981 | 1,969 | 6 | 1,975 |
| total | 4,430 | 1,286 | 5,716 | 4,906 | 1,468 | 6,374 | 4,938 | 1,528 | 6,466 |
| WOMEN IN ACEA | | | | | | | | | |
| % | | | | | | | | | |
| women out of the total workforce | | | 22 | | | 23 | | | 24 |
| female executives out of total executives | | | 14 | | | 19 | | | 18 |
| female managers out of total managers | | | 31 | | | 31 | | | 33 |
| female graduates out of total graduates | | | 43 | | | 43 | | | 44 |
| EDUCATION LEVEL OF THE PERSONNEL | | | | | | | | | |
| number | | | | | | | | | |
| university graduates | 755 | 567 | 1,322 | 904 | 696 | 1,600 | 976 | 765 | 1,741 |
| high school graduates | 2,275 | 583 | 2,858 | 2,541 | 643 | 3,184 | 2,546 | 637 | 3,183 |
| other qualifications | 955 | 45 | 1,000 | 1018 | 55 | 1,073 | 999 | 57 | 1,056 |
| not defined | 445 | 91 | 536 | 443 | 74 | 517 | 417 | 69 | 486 |
| total | 4,430 | 1,286 | 5,716 | 4,906 | 1,468 | 6,374 | 4,938 | 1,528 | 6,466 |
| AVERAGE STAFF AGE | | | | | | | | | |
| years | | | | | | | | | |
| average company age | 48 | 45 | 48 | 48 | 45 | 47 | 48 | 45 | 47 |
| average age of executives | 53 | 51 | 53 | 53 | 51 | 53 | 53 | 52 | 53 |
| average age of managers | 51 | 49 | 50 | 51 | 49 | 50 | 51 | 49 | 50 |
| average age of clerical workers | 48 | 44 | 47 | 47 | 44 | 46 | 47 | 44 | 46 |
| average age of workers | 48 | 48 | 48 | 47 | 49 | 47 | 47 | 50 | 47 |

AVERAGE SENIORITY OF THE STAFF**years**

| | | | | | | | | | |
|---------------------------------------|----|----|-----------|----|----|-----------|----|----|-----------|
| average corporate seniority | 17 | 15 | 17 | 16 | 14 | 16 | 16 | 14 | 16 |
| average seniority of executives | 17 | 16 | 17 | 17 | 16 | 17 | 17 | 17 | 17 |
| average seniority of managers | 20 | 18 | 19 | 19 | 18 | 19 | 19 | 17 | 19 |
| average seniority of clerical workers | 18 | 14 | 17 | 17 | 14 | 16 | 17 | 14 | 16 |
| average seniority of workers | 15 | 18 | 15 | 14 | 18 | 14 | 14 | 19 | 14 |

TYPE OF EMPLOYMENT CONTRACT**number**

| | | | | | | | | | |
|--------------------------------------|--------------|--------------|--------------|--------------|--------------|--------------|--------------|--------------|--------------|
| staff with permanent contract | 4,327 | 1,256 | 5,583 | 4,783 | 1,435 | 6,218 | 4,859 | 1,501 | 6,360 |
| <i>(of which) part-time staff</i> | 26 | 95 | 121 | 23 | 102 | 125 | 20 | 81 | 101 |
| permanent staff | 27 | 8 | 35 | 69 | 19 | 88 | 40 | 11 | 51 |
| staff under apprenticeship contracts | 76 | 22 | 98 | 54 | 14 | 68 | 39 | 16 | 55 |
| total | 4,430 | 1,286 | 5,716 | 4,906 | 1,468 | 6,374 | 4,938 | 1,528 | 6,466 |

Table no. 40 – Movements of personnel (2019-2021)

| u.m. | 2019 | | | 2020 | | | 2021 | | |
|--|------------|-----------|-------------|------------|------------|-------------|------------|-----------|------------|
| | men | women | total | men | women | total | men | women | total |
| INCOMING STAFF: CONTRACT TYPE | | | | | | | | | |
| number | | | | | | | | | |
| permanent | 337 | 70 | 407 | 283 | 82 | 365 | 201 | 82 | 283 |
| fixed-term | 22 | 9 | 31 | 67 | 19 | 86 | 32 | 9 | 41 |
| professional apprenticeship contracts | 9 | 5 | 14 | 17 | 4 | 21 | 5 | 6 | 11 |
| total | 368 | 84 | 452 | 367 | 105 | 472 | 238 | 97 | 335 |
| OUTGOING STAFF: REASONS | | | | | | | | | |
| layoffs | 153 | 16 | 169 | 103 | 18 | 121 | 95 | 25 | 120 |
| early retirement | 46 | 7 | 53 | 35 | 5 | 40 | 41 | 2 | 43 |
| retirement | 2 | 1 | 3 | 10 | 0 | 10 | 10 | 0 | 10 |
| terminations | 7 | 3 | 10 | 8 | 0 | 8 | 8 | 0 | 8 |
| other reasons (*) | 29 | 9 | 38 | 47 | 9 | 56 | 65 | 16 | 81 |
| total | 237 | 36 | 273 | 203 | 32 | 235 | 219 | 43 | 262 |
| TURNOVER RATES, INCOMING AND OUTGOING RATES BY AGE GROUP (**) | | | | | | | | | |
| % | | | | | | | | | |
| turnover rate | 13.7 | 9.3 | 12.7 | 11.6 | 9.3 | 11.1 | 9.2 | 9.2 | 9.2 |
| incoming rate | 8.3 | 6.5 | 7.9 | 7.5 | 7.2 | 7.4 | 4.8 | 6.3 | 5.2 |
| ≤ 30 years | 1.7 | 2.4 | 1.9 | 2.7 | 2.7 | 2.7 | 1.8 | 2.6 | 2.0 |
| > 30 years and ≤ 50 years | 4.7 | 3.7 | 4.5 | 3.8 | 4.1 | 3.9 | 2.5 | 3.6 | 2.8 |
| > 50 years | 1.9 | 0.4 | 1.5 | 1.0 | 0.4 | 0.8 | 0.4 | 0.1 | 0.4 |
| outgoing rate | 5.3 | 2.8 | 4.8 | 4.1 | 2.2 | 3.7 | 4.4 | 2.8 | 4.0 |
| ≤ 30 years | 0.2 | - | 0.1 | 0.1 | 0.2 | 0.1 | 0.2 | 0.4 | 0.3 |
| > 30 years and ≤ 50 years | 0.4 | 0.5 | 0.5 | 0.4 | 0.4 | 0.4 | 0.5 | 0.5 | 0.5 |
| > 50 years | 4.8 | 2.3 | 4.2 | 3.6 | 1.6 | 3.2 | 3.7 | 1.9 | 3.3 |

(*) For 2021, the item includes: 16 deaths (not due to accidents at work), 57 resignations, and 8 contract expirations.

(**) The turnover rate is provided by the sum of hires and terminations of the year relative to the workforce at year end. The Companies to which the data refers are predominantly located in Lazio.

Table no. 41 – Age groups, employment contract length (2019-2021)

| u.m. | 2019 | | | 2020 | | | 2021 | | |
|--|--------------|--------------|--------------|--------------|--------------|--------------|--------------|--------------|--------------|
| | men | women | total | men | women | total | men | women | total |
| STAFF AGE GROUPS | | | | | | | | | |
| number | | | | | | | | | |
| ≥ 25 years and ≤ 30 years | 203 | 80 | 283 | 302 | 91 | 393 | 330 | 105 | 435 |
| > 30 years and ≤ 50 years | 2,166 | 789 | 2,955 | 2,384 | 900 | 3,284 | 2,368 | 929 | 3,297 |
| > 50 years and ≤ 60 years | 1,703 | 374 | 2,077 | 1,822 | 419 | 2,241 | 1,832 | 426 | 2,258 |
| > 60 years | 358 | 43 | 401 | 398 | 58 | 456 | 408 | 68 | 476 |
| total | 4,430 | 1,286 | 5,716 | 4,906 | 1,468 | 6,374 | 4,938 | 1,528 | 6,466 |
| INCOMING STAFF: AGE GROUPS | | | | | | | | | |
| ≤ 30 years | 77 | 31 | 108 | 132 | 39 | 171 | 91 | 40 | 131 |
| > 30 years and ≤ 50 years | 208 | 48 | 256 | 188 | 60 | 248 | 125 | 55 | 180 |
| > 50 years | 83 | 5 | 88 | 47 | 6 | 53 | 22 | 2 | 24 |
| total | 368 | 84 | 452 | 367 | 105 | 472 | 238 | 97 | 335 |
| OUTGOING STAFF: AGE GROUPS | | | | | | | | | |
| ≤ 30 years | 7 | 0 | 7 | 6 | 3 | 9 | 12 | 6 | 18 |
| > 30 years and ≤ 50 years | 19 | 7 | 26 | 18 | 6 | 24 | 25 | 8 | 33 |
| > 50 years | 211 | 29 | 240 | 179 | 23 | 202 | 182 | 29 | 211 |
| total | 237 | 36 | 273 | 203 | 32 | 235 | 219 | 43 | 262 |
| DURATION OF THE EMPLOYMENT CONTRACT OF THE OUTGOING STAFF | | | | | | | | | |
| ≤ 30 years | 85 | 13 | 98 | 94 | 14 | 108 | 121 | 17 | 138 |
| > 30 years and ≤ 50 years | 152 | 23 | 175 | 109 | 18 | 127 | 98 | 26 | 124 |
| total | 237 | 36 | 273 | 203 | 32 | 235 | 219 | 43 | 262 |

HOURS WORKED, SALARY AND PENSION FUNDS

HOURS WORKED IN ACEA

Acea works in compliance with labour legislation and in accordance with the National Collective Bargaining Agreements of reference, with a particular focus on cases relating to working hours and the duration of work, minimum guaranteed wages, age categories and restrictions on the use of legal child labour, proper management of disadvantaged categories.

Following the continuation of the Covid-19 health emergency, in line with the security measures imposed at government level, Acea has maintained **remote working** as the main working method, mainly for staff with administrative profiles.

Hours worked in the year, ordinary and overtime, excluding man-

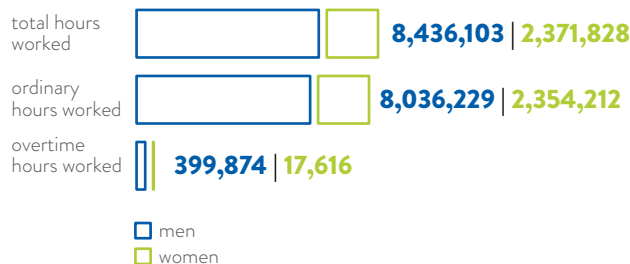
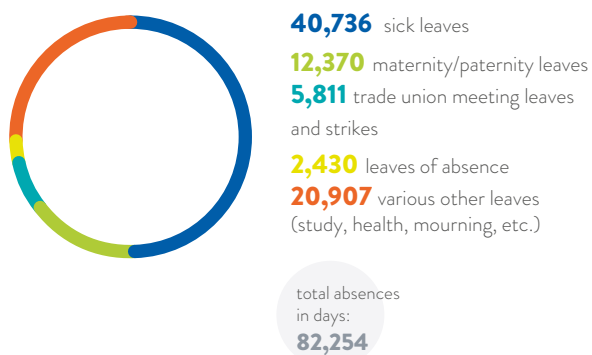
agers, amounted to **10,807,931 hours** of which **78% by male staff** (8,436,103 hours), due to the higher proportion of men in the company's workforce (76% of the total).

Analysing the overtime **hours, the influence of gender** is even more evident: **96% of overtime is in fact attributable to men** and **only 4% to women** (please also see the sub-paragraph Remuneration).

Days of absence totalled 82,254, mainly due to illness, leave (for reasons of study, health, etc.), **maternity/paternity leave, trade union and other reasons** (study, health, generic) (see Chart no. 44 and Table no. 42).

The **absenteeism rate for the year was 2.7%** (3% for men and 2% for women), down from 3% in 2020.

Chart no. 44 – Hours worked by the staff and absences (2021)



In addition to leave, staff can access reduced working hours, in accordance with the terms defined by the company: in 2021, **part-time** staff amounted to around **1.6% of total staff**.

For managers and **stage-three workers**, independent scheduling is permitted, which allows the “personalized” management of work **schedules**, in compliance with contractual provisions.

For **employees with a “fixed schedule”**, arrival and departure **flexibility** is permitted, according to established slots, and a **total number of monthly hours of leave** can be used during the times established.

Remote working is an agile and flexible working method that Acea has adopted on an experimental basis since 2018 to promote work-life balance; because of this choice, **the company was able to re-organise its working methods as from the start of the pandemic emergency, which continued into 2021**, by placing most of its staff into remote working mode (see also the section on Staff development and communication).

SALARIES

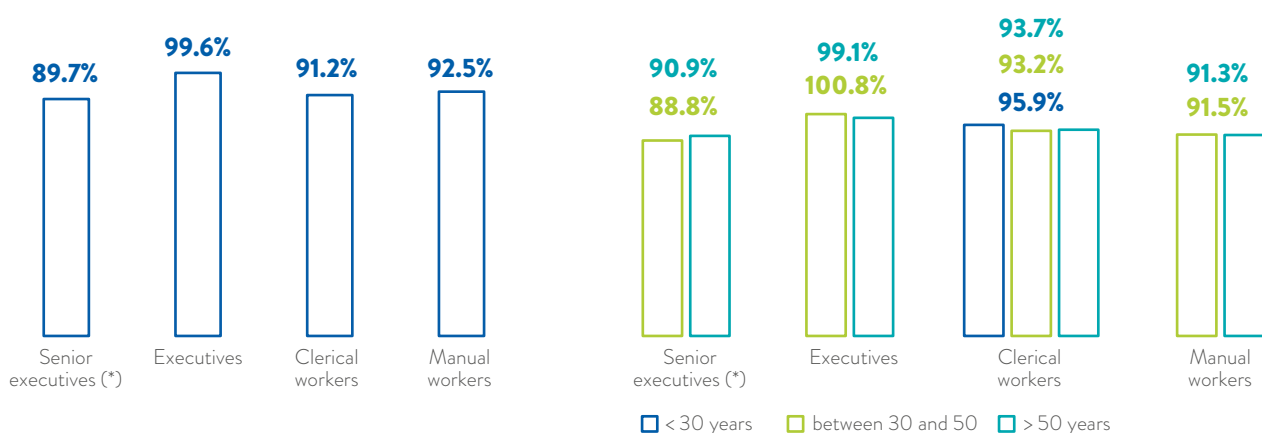
The **wages** that Acea pays its employees, excluding executives and top management, are determined by applying the **National Collective Bargaining Agreements (CCNL)** of reference, which ensure the minimum salary levels according to professional categories.

The company also adopts a **remuneration policy** that applies **merit-based principles** to the fixed and variable components of the remuneration, determining remuneration that is above the minimum salaries set by the National Collective Bargaining Agreements.

The **percentage weight of gross average effective remuneration of women**, including fixed and variable components, **as compared to that of men** shows that for executives, the pay gap is the highest and amounts to 10.3%, in favour of men; for middle managers, women's and men's salaries are essentially aligned and men receive only 0.4% more remuneration than women; for clerks and manual workers, the pay gap is 8.8% and 7.5% respectively, again in favour of men, due to the fact that activities with higher additional remuneration (on-call, shifts, allowances, overtime, etc.) are mainly carried out by men.

Breaking down the data further **by age group**: the pay gap narrows slightly for female managers over 50, who accrue more variable elements of their pay over time; female executives aged between 30 and 50 receive pay that is 0.8% higher than that of men in the same age bracket; finally, the pay gap narrows, in particular, for female employees under the age of 30, demonstrating that the remuneration for the new and more qualified jobs required by the company are more uniform from a gender perspective (see chart no. 45 and table no. 42).

Chart no. 45 – Women's pay as a percentage of men's pay by qualification and age group (2021)



(*) The item does not include senior managers benefiting from the Long Term Incentive Plan (LTIP).

PENSION FUNDS AND DEFINED CONTRIBUTION PLANS

Supplementary pensions are a form of **voluntary contribution** aimed at generating income that is supplementary to the pension, the amounts paid by workers being invested in the financial market by specialized operators.

The pension funds of reference for Acea staff are: **Previndai**, reserved for executives, and **Pegaso** (managed jointly by Utilitalia and Trade Union Organisations) for non-management staff, to whom the National Collective Bargaining Agreements of the electrical and gas-water segments apply.

The **Pegaso Fund** adopted a 2019-2021 Strategic Plan that illustrates the **organisation's management guidelines, including in-**

struments for measuring ESG factors (environmental, social and governance).

There were **2,973 Pegaso members among the Acea employees** in the year, a slight increase on 2020 (2,909 members). By analysing the distribution by gender of the members, **76% are men** and **24% are women** (please see Table no. 42). The company paid about € 6 million in severance pay to the fund and about € 2.1 million in supplementary contributions; for some years it has been possible to pay part or all of the performance bonus into the fund, benefiting from an additional share paid by the company.

Table no. 42 – Hours worked, absences, remuneration and members of the supplemental pension fund (2019-2021)

| u.m. | 2019 | | | 2020 | | | 2021 | | |
|--|------------------|------------------|------------------|------------------|------------------|-------------------|------------------|------------------|-------------------|
| | men | women | total | men | women | total | men | women | total |
| HOURS WORKED BY THE STAFF | | | | | | | | | |
| hours | | | | | | | | | |
| regular | 6,250,724 | 1,941,510 | 8,192,234 | 7,771,112 | 2,256,024 | 10,027,137 | 8,036,229 | 2,354,212 | 10,390,441 |
| overtime | 369,398 | 29,464 | 398,862 | 399,694 | 14,871 | 414,565 | 399,874 | 17,616 | 417,489 |
| total hours worked | 6,620,122 | 1,970,974 | 8,591,096 | 8,170,806 | 2,270,896 | 10,441,702 | 8,436,103 | 2,371,828 | 10,807,931 |
| TYPE OF ABSENCES | | | | | | | | | |
| days | | | | | | | | | |
| sick leave | 29,279 | 10,969 | 40,248 | 35,163 | 7,815 | 42,978 | 33,518 | 7,218 | 40,736 |
| maternity/paternity | 1,118 | 9,278 | 10,396 | 1,499 | 7,929 | 9,428 | 1,730 | 10,640 | 12,370 |
| strike | 82 | 28 | 110 | 0 | 0 | 0 | 1,159 | 257 | 1,416 |
| trade union leave | 5,159 | 584 | 5,743 | 3,756 | 377 | 4,133 | 3,996 | 399 | 4,395 |
| leave of absence | 1,313 | 379 | 1,692 | 2,015 | 734 | 2,749 | 1,617 | 813 | 2,430 |
| miscellaneous leave (study, health, bereavement and general reasons) | 15,631 | 8,022 | 23,653 | 18,402 | 5,378 | 23,780 | 16,157 | 4,750 | 20,907 |
| Total absences (not incl. holidays and accidents) | 52,582 | 29,260 | 81,842 | 60,835 | 22,233 | 83,068 | 58,177 | 24,077 | 82,254 |
| AVERAGE GROSS FEMALE PAY AS A PERCENTAGE OF MALE PAY BY QUALIFICATION (*) | | | | | | | | | |
| % | | | | | | | | | |
| executives | | 96.2 | | | 98.2 | | | 89.7 | |
| managers | | 97.1 | | | 98.2 | | | 99.6 | |
| clerical workers | | 87.6 | | | 87.8 | | | 91.2 | |
| workers | | 99.6 | | | 94.6 | | | 92.5 | |
| AGE GROUPS AND GENDER OF THE EMPLOYEES ENROLLED IN THE PEGASO FUND | | | | | | | | | |
| number | | | | | | | | | |
| ≤ 25 years | 20 | 0 | 20 | 32 | 0 | 32 | 56 | 3 | 59 |
| > 25 years and ≤ 30 years | 65 | 26 | 91 | 92 | 25 | 117 | 103 | 29 | 132 |
| > 30 years and ≤ 35 years | 126 | 66 | 192 | 143 | 70 | 213 | 155 | 76 | 231 |
| > 35 years and ≤ 40 years | 186 | 88 | 274 | 202 | 103 | 305 | 224 | 90 | 314 |
| > 40 years and ≤ 45 years | 249 | 78 | 327 | 261 | 89 | 350 | 258 | 99 | 357 |
| > 45 years and ≤ 50 years | 320 | 105 | 425 | 293 | 101 | 394 | 293 | 96 | 389 |
| > 50 years and ≤ 55 years | 469 | 136 | 605 | 466 | 144 | 610 | 454 | 154 | 608 |
| > 55 years and ≤ 60 years | 423 | 119 | 542 | 440 | 112 | 552 | 434 | 102 | 536 |
| > 60 years | 293 | 49 | 342 | 276 | 60 | 336 | 276 | 71 | 347 |
| total | 2,151 | 667 | 2,818 | 2,205 | 704 | 2,909 | 2,253 | 720 | 2,973 |

(*) 2019 and 2020 data do not include AdF and GORI.

INDUSTRIAL RELATIONS



68% of employees
are **union members**



Agreement signed with **trade unions** regarding the
Isopension plan



Agreement
signed on **funded training** to enhance
company know-how

Acea applies the **Single Contract for the electricity sector** and the **Single Contract for the gas-water sector**. **All the workers** are therefore **covered by national collective bargaining agreements**. In 2021, **unionisation** was around **68%**. There are 273 employees who hold **management or trade union representation positions**; of these, **19 hold positions of Workers' Safety Representatives (RLS)**, designated following an agreement.

The **Labour-Management Relations Unit** of the Parent Company (Human Resources Function) **oversees the company's policies regarding trade union relations**, ensuring consistency with the Group's objectives. The discussions on the specific corporate requirements are conducted within the framework of national collective bargaining (CCNL) at the sector level, and between companies and internal employee representatives.

The **Labour-Management Relations Model** applied in Acea defines a **system of high-profile trade union relations** based on **bilateral agreements and participation**, combining **business objectives and social demands**.

The **Labour-Management Relations Protocol** structures the system of union participation and dialogue on **three levels** – Group, industrial segment and corporate – and provides for **several areas of comparison**: economic and financial performance, employment policies, selection, promotion, development and training of staff, occupational safety, corporate welfare, promotion of diversity & inclusion; industrial policy and investment plans; performance bonus, organisation of working hours, technical and specialized training and professional development.

Acea also has a **consultation procedure for workers**, that can be applied directly or through their representatives. It covers issues such as **occupational safety, respect for the environment and sustainable development of production activities** and, in order to favour the involvement of employees in trade union relations activities, it has set up a **dedicated e-mail address**.

There are also **Bilateral Commissions**, composed of company representatives and employees, **who express their opinions on key issues, such as training, smart working, corporate welfare and occupational health and safety**.

The company promotes the models for participation in Trade Unions, such as **Unitary Trade Union Representations (RSU)** and **Workers for Safety and the Environment (RLSA)**.

In 2021 Acea signed several **agreements** with the trade unions (OO. SS.), **concerning the organisation of work and the management of**

health emergencies, funded training and the performance bonus.

In particular, with the Agreement of 26 March 2021, **front-end workers at Acea Energia** were able to carry out their work activities remotely, through the **activation of a digital work tool**, thus guaranteeing the provision of services to customers, even in an emergency.

Agreements on measures to contain and combat Covid-19 were **confirmed and renewed** in line with the provisions of the National Protocols, **the regulation concerning remote working in emergencies, flexible working time and remote learning** which are designed to allow work to continue safely and with organisational flexibility.

In line with the provisions of the **Agreement regulating what is known as the "Isopension"** [early retirement] signed last year, in 2021 the agreement regulating the **Plan implementation criteria** for employees who become eligible for early retirement as of 1 August 2022 was signed, in part to manage generational turnover.

In July, Acea signed a **protocol on diversity & inclusion** with the trade union, which emphasises the centrality of the **principles of gender equality, social inclusion, combating all forms of discrimination and valuing diversity** (see also paragraph Diversity, inclusion and welfare).

Moreover, in implementation of the provisions of the Agreement of 23 December 2020 concerning the **New Skills Fund** during the year, **a training project was implemented to broaden and re-configure staff skills**, due to the introduction of organisational and technological innovations and the related need for retraining the introduction of organisational and technological innovations and the related need for professional retraining. Also, **a funded training agreement was concluded** aimed at strengthening the Company's know how while increasing the level of satisfaction and motivation of workers, enriching their professional skills (see also the section on Development and human resources communication).

Finally, the **Group Agreement on the Performance Bonus** for the three-year period **2021 to 2023** is particularly noteworthy. It allows employees to convert the amount of the bonus into "welfare credit".

As regards the **information notice to the employees regarding possible organisational changes or corporate reorganisations that effect employment relations**, Acea takes different positions depending on the situations explained below:

1. Organisational changes: in the event of establishment of new Units or changes in assignments or responsibilities, the Human Resources Department issues an Organisational Provision and

sends a communication to the competent functions, which post it on the bulletin board and the company intranet. In the event of organisational changes that affect the staff, the trade union representatives are informed. If they concern a single employee (change in workplace, schedules, etc.), they are notified by the Human Resources Unit of the person's Company;

2. **Corporate reorganisations:** in the event of reorganisation, as a result of significant organisational and production changes, with effects on working conditions and employment, the methods of informing the employees and the Trade Union Representatives,

are regulated by the CCNL applied in the Group and by the Labour-Management Relations Protocols;

3. **corporate transformations** (such as alienations, mergers, acquisitions, transfers of company branches): in cases of corporate transformation, the notices to the employees are regulated by the legislation in force¹⁰⁶, which anticipates information obligations towards employees that allows them to verify the business reasons for the transactions, the correct methods of the process and the consequences on the employment relationship.

DISPUTES WITH EMPLOYEES AND TRADE UNIONS

The labour disputes in Acea mainly concern **dismissals, classification changes, differences in remuneration, indemnities not received, demotions, harassment and employment relationships**.

In 2021, there were **23 new labour disputes** (46 in 2020), most of which were **initiated by employees of the Companies**. A total of **76** labour disputes were pending as at 31 December 2021 - including those initiated in previous years.

OCCUPATIONAL HEALTH AND SAFETY



Acea sets up a Covid-19 **vaccination hub** at its corporate site, open to all citizens



Acea Energia and Acea Elavori achieve **Biosafety Trust Certification** for infection prevention and control



over **58,600** hours of training on occupational health and safety provided to staff



The **accident indices** were essentially stable: **FI 5.09** and **SI 0.20**

Acea is committed to a **widespread safety culture** both in Group Companies, through the direct involvement of employees, and along the supply chain (please see the Suppliers chapter).

Safety management is structured at the organisational level and all Companies for which the parent company considers certification important, due to the size of the workforce and the type of activities carried out, have implemented **Certified Management Systems**¹⁰⁷ (please also see the *Corporate Identity*, *Corporate Governance* and *Management Systems* chapter).

The Occupational Safety Unit of the parent company is in charge of the coordination and direction in this area, monitoring the companies on the application of legislation, guidelines and company policies.

Each Group Company **has direct responsibility for the operational management of safety** and takes care of **training the personnel, monitoring accidents** and assessing the **risks to the workers**, preparing the **Risk Assessment Document (RAD)**. Following these activities, the **Occupational Safety Unit prepares a centralised annual accident report** for Group Companies.

The analysis method of the accidents follows the **Guidelines for the classification of accidents**, prepared by Utilitalia and in compliance with the **standard UNI 7249/95**, with reference to the INAIL measurement criteria and the instructions of ESAW (European Statistics of Accidents at Work).

In accordance with the law, Acea **identifies the dangers present in the company's activities** which may cause injury or illness through

¹⁰⁶ Article 2112 of the Italian Civil Code and Article 47 of Law 428/90 as subsequently amended and supplemented.

¹⁰⁷ Companies with seconded or no staff are therefore excluded.

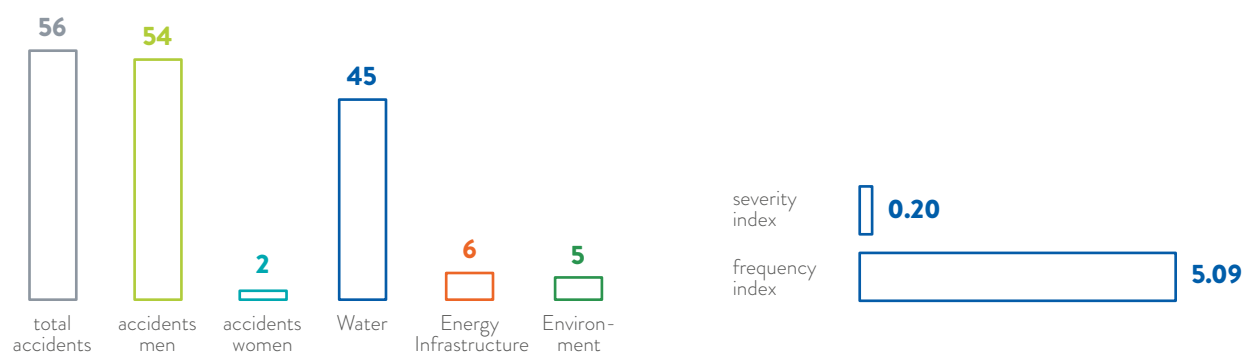
inspections carried out jointly in the workplace by the **Head of the Prevention and Protection Service (RSPP)**, the Company Physician, the **Workers' Safety Representatives (RLS)** and the Unit Heads, who are involved from time to time. Then the company assesses the risks to workers' health and safety in relation to the hazards detected in the workplace, verifies the possibility of eliminating them, adopts **preventative and/or protection measures** to implement to keep the risks under control and draws up the Risk Evaluation Document (RAD). In the case of accidents, an investigation is launched to determine the causes of the event and identify appropriate corrective actions to prevent it recurring. With a view to **constantly improving the operational management of occupational safety**, Acea has developed **Group Safety Guidelines** and a **HSE (Health, Safety, Environmental) Dashboard** to measure and monitor performance data, also in relation to sector benchmarks, and to implement improvement measures.

To **manage the emergency situation that continued in 2021**, in accordance with regulatory provisions, Acea continued to share the prevention and protection initiatives against coronavirus with the **Group Workers' Safety Representatives (RLS)** and the **Group RSPP (Prevention and Protection Service Manager) Coordination Committee**.

Acea is certified according to the **Biosafety Trust Certification** management system (see also Corporate Identity in chapter Corporate Governance and Management Systems) and, as required by the certification, has set up the **Committee for the prevention and management of Coronavirus and other infections**. This Committee is composed of the Competent Doctor and the main Acea Functions and its purpose is to coordinate infection prevention and management activities, monitor the epidemiological context, and take the necessary actions to counter the emergency. In addition, Acea SpA and the other Group companies have constantly **updated their relevant risk assessment documents (RAD) in accordance with the provisions of the measures to combat the spread of the coronavirus**.

In 2021 the **number of accidents increased slightly** compared to compared to last year: **56 accidents** (51 in 2020) **occurred in the course of work activity** and **19** while commuting from home-work¹⁰⁸; the accident rates have **essentially remained stable**: the **frequency index** is equal to **5.09** and that **severity index** stands at **0.20** (see chart no. 46 and table no. 43). All the accidents involved **minor injuries**, 34 were **"occupational" accidents** and **22 were "non-occupational"**. The **main causes of injury** are: tripping, hitting, slipping, cutting, crushing, falling from heights, animal bites and insect bites.

Chart no. 46 – Accidents and indices by gender and business area (2021)



NOTE: Male frequency index **4.91** and female frequency index **0.18**; male severity index **0.19** and female severity index **0.01**. The graph shows only those business areas that reported accidents during the year.

Analysing the **breakdown of accidents by gender** (net of accidents occurring during commutes) shows that **54 accidents involved male personnel** of which 44 were blue collar workers, 9 white collar workers and 1 manager, and **2 accidents occurred to female staff** with an administrative profile.

The companies with the highest number of accidents, not including those occurring during commutes, are: Acea Ato 2 (16 accidents), GORI (15 accidents) and AdF (7 accidents), which naturally have **greater exposure to the risk** of accidents in relation to the type of activity performed.

Acea has implemented and maintained multiple prevention and protection measures to contain contagions in view of the continuing Covid-19 pandemic emergency in 2021. In particular, the company has:

- **kept up-to-date the Circulars, internal Guidelines and Health**

Protocols drawn up by the Competent Doctors and the **Protocol for the Management of Covid-19 cases** in the company;

- **revised the Risk Assessment Document**, with the new assessment of the biological risk related to the Sars-Cov-2 virus, and the **emergency plans**;
- implemented new prevention and protection measures;
- organised **screening campaigns for employees and the staff of contractors**;
- planned **information and training courses for all employees and set up dedicated communication channels**.

In order to make the working environment safe, Acea has **reorganised the way people access company premises** and consolidated the **procedures for the management of common spaces** planning attendance through the Acea4You app platform, **intensifying the**

¹⁰⁸ Accidents *during commutes* relate to travel from home to work and from work to home, using private or company vehicles, which take place outside of working hours, as established by the relevant Federutility note. They are not included in the calculation of accident indices used herein.

cleaning, sanitation and sterilisation shifts in the workplace, installing thermoscanners for measuring body temperature at entrances and sanitizing films that reduce the bacterial load were placed on lift buttons and food and drink dispensers, bathroom handles and on staircase handrails, and **multi-layered antibacterial mats** for shoe soles were placed at the entrances.

Operational staff, who continued to provide services in the field and in contact with the public, were given specific **personal protective equipment (PPE)** and provided **with information sessions** on their correct use.

Lastly, with a view to providing staff with health prevention tools, the company implemented a **flu vaccination campaign** aimed at employees and the **family members who live with them**.

Acea has also offered **serological tests for detection of Spike pro-**

tein antibodies to all employees; testing is on a voluntary basis and about 3,000 people have participated; at the company's Medical Centre, Acea has provided **chromatography tests for the qualitative detection of the virus in saliva samples** and has activated an agreement with the **Policlinico Gemelli** and the **Paideia Clinic**, reserved for staff and relatives, to perform molecular swabs and rapid antigen swabs.

Finally, the company has maintained its **Covid-19 insurance policy** in 2021 to provide personnel infected with Covid-19 with adequate insurance cover, including for their families.

In 2021 Acea implemented an important initiative to help fight the Covid-19 pandemic: **the activation of the Vaccine Hub** (see box).

ACEA VACCINE HUB

In May 2021 in collaboration with the Covid Crisis Unit of the Lazio Region and ASL Roma 1, Acea was the **first Italian multi-utility company to set up a vaccination centre, open to the local area and citizens**, at one of its corporate headquarters and made a concrete contribution to the national and regional vaccination campaign.

Acea's Occupational Safety Unit was directly involved in the **design and commissioning of the facility**, which is situated on company premises, planned and implemented the actions necessary to set up

the vaccination centre.

The Vaccination Centre is equipped with **26 stations that handle incoming patients, 15 vaccination lines, over 60 observation stations and medical and nursing staff**, employed under an agreement with the Paideia Clinic.

More than **140,000 doses of Covid-19 vaccine were administered at the Acea Vaccine Hub, from May to December 2021**.

The Parent Company's **Occupational Safety Unit** is also tasked with promoting healthy working environments and **mitigating work-related stress**. In 2021, special care was devoted to staff in psycho-physically fragile conditions, accentuated by the pandemic, with the activation of the **I Care project**. Specifically, the project involved **48 women** who are unit managers of Acea SpA, in the programme **I Care** programme for individual and professional well-being, **52 men** Acea SpA Unit managers in the programme **Actions and Reactions** and, in the final phase of the programmes, their staff and other professionals were involved too.

In the last two months of the year, the 100 people hired participated in the final phase of the project and were included in **Acea's We-Care programme for men and women**, working both on recognising signs of stress and on the metaphor of the emergency, the pandemic in particular, to share how communication management not only improves the working climate but is an indispensable tool for positively directing behaviour.

The three paths, implemented in 2021, represent the first risk mitigation of work-related stress experience designed by Acea SpA, which will lead to other initiatives aimed at listening and responding to the needs related to the provision of support, including psychological support in the workplace.

The Group Companies train workers and supervisory staff regarding occupational health and safety in compliance with current legislation (please also see the sub-paragraph below Staff training and development).

Also in 2021, the training provided by Group Companies in partnership with the activities carried out by the Parent Company were mainly focused on the measures adopted to prevent the spread of Covid-19 and this was done via **e-learning** with *ad hoc* training videos and tutorials.

Below are some initiatives carried out:

- **Acea SpA** organised and delivered the in-house training course **Sars-Cov2 - Insights and aspects of biosafety and occupational medicine**, which trained **669 people** on: biological risk, chemical risk, biosafety, occupational medicine and hygiene, vaccines and prevention, and diagnostic tests. In addition, in order to raise employees' awareness on how to behave in case of emergency, the course "**Emergency Management - Knowledge and Awareness**" was delivered, involving **232 people**. The course, divided into 4 sessions, also dealt with the theme of "**Emergency and Disability**", illustrating the most effective assistance techniques to manage the different types of disabilities (motor, sensory, cognitive) in case of evacuation, also making participants aware of the attention paid to temporary disabilities;
- **Acea Ato 2** launched the **Camper della Sicurezza** [Safety Camper] project, which enabled the widespread promotion of the culture of safety in the workplace, through mobile initiatives carried out at all of the company's workplaces and construction sites; finally, with reference to the management of the health emergency, Acea Ato 2 set up the **Committee for the management of measures to prevent the Covid-19 virus**, a special body whose objective is to monitor the epidemiological situation and supervise the evolution of the emergency situation;
- Through the activities of the internal Coronavirus Prevention Committee, **Acea Ato 5** organised an **information campaign on the evolution of the pandemic situation and the expected correct behaviour**, which was aimed at staff. It also carried out the **Reset 2.0 project**, with meetings aimed at all operational staff, aimed at verifying the skills acquired and sharing issues relating to health and safety at work. Finally, specific training was provided on the use of multi-gas detector calibration stations, an activity that was fully in-sourced in 2021;

- **AdF** provided **safety education and training**, in particular, for operational staff (45 people were provided with 180 hours of training) who were trained in the use of new **recovery devices for interventions in confined environments**, used for cleaning and restoration of drinking water accumulations;
- **Acea Ambiente** disseminated informative **videos about anti-Covid measures at some of its facilities and provided e-learning training for Covid-19**;
- **Areti** continued staff training at its **Training Camp**, albeit reorganising in accordance with the new rules imposed by the pandemic, a **space dedicated to training on workplace health and safety**, (safe ascent/descent on medium and low voltage power line poles; safe access to confined underground areas; the use of work/safety tools, training for emergencies in a dangerous environment, etc.). The Company has organised a **training course on electrical risk**, carried out internally through the Training camp with the collaboration of external certified and qualified training organisations, and a **training course on occupational safety** for all operational employees. In 2021, the Company provided a total of **16,610 hours of education and training in the field of safety at work**, involving **1,092 people**;
- **Acea Energia** has carried out drills, with the participation of emergency workers, for the management of the suspected Covid case in the company. In 2021, as a further measure to combat the health emergency, the **Company obtained Biosafety Trust Certification**, implementing an infection prevention and control management system and setting up a **Committee dedicated to the prevention of Coronavirus and other Infections**; a **Coronavirus Emergency Handbook** was also drawn up and distributed to the entire company population by e-mail;
- **Acea Innovation** trained **17 people on safety** (high and medium risk work, first aid and electrical risk), providing a total of **260 hours of training**;
- **Acea Elabori** provided a total of **3,637 hours of education and training in the field of safety at work**, involving **318 people**; In particular, courses were organised to **update safety coordinators at temporary and mobile sites (CSE and CSP)**, **fire prevention officers (ASA)** – also for high risk – and **first aid officers (APS)**, and **training was provided on confined spaces and chemical and biological risks** for the staff of the Laboratory and Research Unit. In addition, in order to obtain **Biosafety Trust certification (achieved at the end of the year)**, **specific training** was carried out to monitor the procedures adopted for infection prevention and control;
- In addition to continuing the training of transport (particularly road) staff, **Aquaser organised safety training courses for operational transport staff and technical-administrative staff**;
- In 2021, GORI implemented the **Well at Work project**, aimed at **the entire company population**, in particular personnel working remotely who are more exposed to stress and the adoption of sedentary and unhealthy habits and lifestyles, which included the organisation of two training modules focusing on stress/posture and addictions/nutrition. Thanks to this training initiative, the company was one of the eight finalists in the Well@Work 2021 - Charge the Energy contest, organised by the Human Resources Community (HRC), in which more than 60 companies of national significance participated;
- **Gesesa conducted 9 training courses on occupational safety, with a total of 628 hours of training provided and 48 people involved**. In regard to the health emergency, all staff received periodic updates on the evolution of the pandemic situation and were informed about safety measures and conduct required to

avoid an increase in contagions in the company. Gesesa has also set up a **dedicated screening plan**, offering staff the opportunity to undergo periodic molecular or antigen based swabs at a centre that has an agreement with the company.

Over 58,600 total hours of training were provided to Group personnel in the field of occupational safety in 2021.

Table no. 43 – Health and Safety (2019-2021)

| number | 2019 | 2020 | 2021 |
|---|-------------|-------------|-------------|
| ACCIDENT BREAKDOWN BY BUSINESS AREA | | | |
| Water | 70 | 31 | 45 |
| Energy Infrastructure | 16 | 13 | 6 |
| Generation | 0 | 0 | 0 |
| Energy (Commercial and Trading) | 0 | 0 | 0 |
| Environment | 4 | 4 | 5 |
| Engineering and Services | 3 | 2 | 0 |
| Corporate (Acea SpA) | 2 | 1 | 0 |
| total | 95 | 51 | 56 |
| ACCIDENT INDICES | | | |
| total days of absence | 2,884 | 2,044 | 2,195 |
| Frequency Index (FI) (number of accidents per 1,000,000/working hours)(*) | 9.74 | 4.84 | 5.09 |
| Severity Index (SI) (days of absence per 1,000/working hours)(*) | 0.30 | 0.19 | 0.20 |

(*) the hours worked used to calculate the accident indices differ from the hours worked illustrated in the sub-section *Hours worked in Acea*; the two processes meet different operational requirements and specific calculation parameters are applied to each.

NOTE: The Water Operations area includes 5 companies, the Energy Infrastructure area 1, the Generation area 3, the Energy area 3, the Environment area 5, the Engineering and Services area 1 and the Corporate area 1. The data in the table does not include accidents currently being assessed.

HEALTH MONITORING

Health monitoring, regulated by a **company procedure** that defines its **planning and management**, is carried out **in cooperation with external professionals** in compliance with current legislation (art. 41 of Legislative Decree no. 81/08).

Formally appointed doctors conduct medical examinations prior to employment, in the event of a position change, periodically according to health protocols, **at the worker's request** and **prior to resumption of work** following absence for health reasons lasting more than 60 continuous days.

Workers **exposed to specific risks** are included in a **targeted check-up programme**.

In collaboration with the employers and the relevant Protection and Prevention Service Managers (RSPPs), the **Competent Doctors define health protocols** according to the workers' exposure to the various risks and **draw up those to be implemented at the Group companies**.

At the headquarters a **First Aid Office** provides staff and visitors with first aid in the event of illness; since December, the first aid service is available from 08.00 to 20.00.

In 2021, there were **4,245 medical appointments** provided to the same number of employees of Group companies for whom the occupational medicine service is managed centrally by Acea SpA, for

a total economic value of approximately € 440,000 (including the amount relating to the company's first aid service and that relating to analyses and specialist visits carried out at the Pigafetta and Marilab CDO centres).

Health monitoring includes the **prevention of occupational diseases** that workers may contract due to **prolonged exposure to the risk factors** existing in the work environment. In the context of the work performed by the companies of the Group, for which Acea provides the health monitoring service, **there are no risk profiles likely to**

cause occupational diseases. The competent doctor has the task of cooperating with the employer in order to define preventive measures and health protocols for the risk profiles associated with specific duties, and monitoring any damage to workers' health, issuing suitability assessments, and applying limitations and prescriptions, where necessary, in order to prevent possible occupational diseases. In 2021, in Acea, **there were no reports of suspected occupational diseases.**

HUMAN RESOURCE DEVELOPMENT AND COMMUNICATIONS



Acea participates in the **DNA Inclusive Job Day**: matching job supply and demand for people from protected categories



The **Talent Day** and the **Talent Graduate Program** for the selection of young graduates in economics and STEM disciplines



The **Acea Business Model**: key behaviours for the success of the organisation



Adopted the new **Long Term Incentive Plan (LTIP)** introducing a composite sustainability indicator

The pandemic continued in 2021 as did its impact on society and more particularly, work. Acea has continued to provide its people with **working methods and tools adapted to their specific working and living conditions** with the objective of **preserving people's involvement in the Group's identity**, developing skills through remote training and ensuring **organisational well-being** through targeted initiatives.

As mentioned, **remote working has prevailed**, thanks to the **digitalisation of business processes and the Teams digital workspace platform**.

STAFF SELECTION

The **selection process** is regulated by a **Group procedure that was updated in 2021**, which governs the search for skills in the labour market. In particular, **the format for drafting job descriptions has been rendered more effective insofar as describing the job opportunities offered by Acea** and a declaration has been added regarding the **promotion of and respect for the principles of diversity & inclusion in selection processes**.

Acea further **strengthened its recruiting network**, with a major focus on **social media channels**. In 2021, **267 searches for personnel took place**, in an effort to cover more than 400 positions. A significant number of these positions were published on the institutional

website and **concerned individual or group profiles for one or more positions within Group companies**, involving about 25,000 candidates.

The selection process can include **several stages depending on the specifics of the search**: CV screening, online challenges using gamification (technical quizzes and business games to assess numerical reasoning, verbal ability, visual-spatial skills, logic), video interviews, assessment of soft skills, motivation and skills through collective tests and individual interviews. During the year, **new tools were developed and used to digitise and improve the selection process**, both in the CV screening phase through the implementation of a dedicated system which, thanks to artificial intelligence, supports and speeds up the decision-making process of the Group's recruiters, and in the recruiting phase recruiting through the use of personality tests based on the Acea Leadership model, digital mindset tests and video interviews to render the in-depth screening of candidates more effective and faster.

The security measures taken **required selection activities to be carried out digitally, while respecting the deadlines for the introduction of new resources and business continuity**. To this end, several **selection days** were organised for multiple roles, including the **Areti Talent day**, a selection project that led to the placement of ten young talented graduates in STEM disciplines, and the **Acea Energia and Acea Innovation Talent Graduate Program** (see box).

ACEA ENERGIA AND ACEA INNOVATION TALENT GRADUATE PROGRAM

The Acea Energia and Acea Innovation Talent Graduate Program, a selection process dedicated to young graduates in economics and STEM disciplines, took place in 2021.

The programme, launched in August, involved **around 1,000 young people who took part in several entirely digital selection steps, in which participants faced a number of online challenges concerning soft skills and technical knowledge followed by group role playing.** The last phase **involved team project work, designed from a diversity perspective, in response to a business challenge.**

Acea also participates in **professional orientation events** promoted by university bodies, to meet new graduates and soon-to-be graduates to include in their selection processes. Again, the meetings took place via digital platforms. Some **Live Webinars about the Acea Group** were made for these events to explain the search and selection process and answer the questions of the participants. In particular, Acea took part in: **The Placement Exchange, Almalaura High Flyers Day Information Technology, Cesop Virtual Job Meeting Stem Girls, Start Hub Digital Recruiting Week STEM, Almalaura Digital career day at work, LUISS Career day "young people and work" and Dna Inclusive Job Day**, an online event during which **Acea together with other companies, met with people included in protected categories** whose integration into the labour market can be more difficult (see also the paragraph Diversity, inclusion and welfare).

During the year, a Group dashboard was developed with indicators for **analysing the progress of each stage of the selection process** and understand how diversity targets change.

GROUP CULTURE AND STAFF ENGAGEMENT

In 2021 Acea embarked on the process of defining a **new Leadership Model which brings together the key behaviours useful to guide the success of the organisation.** The model is the guide to which each employee must refer in his or her working life, acting proactively to achieve the Group's objectives.

This initiative applies to the **recruitment** process, aimed at hiring talent consistently with the Group's values, the performance management process, which measures each person's contribution to the defined values, the **training and development** as well as **compensation policies**, whose objective is developing and enhancing people and capabilities.

The new model was designed with the **active involvement** of the Group's people, in **focus groups** to define the proposed output.

A specific communication campaign aimed at the entire company population is planned for the initial months of 2022, to promote the new Model. This will be followed by specific training and information events.

The **employee engagement activities** implemented in 2021 to increase people's **sense of belonging** to the Group included:

- **Team Building**, an initiative dedicated to the first and second line structures of the Energy area (Commercial and Trading), aimed at stimulating a constructive discussion on strategic orientations and business guidelines that influence future activities (self-confidence, team, relationship and innovation). This was also an opportunity to celebrate achievements, strengthen interpersonal relationships, increase collaboration between

The final stage of the selection process took place in November at the company's La Fornace conference centre where **the 38 selected prospects presented their business cases to the Group's management and gave individual interviews.** Finally, **7 girls and 2 boys were selected and started their career in the company.**

Talent, skills and energy were the drivers behind the selection process. The use of innovative methodologies and accurate assessment tools made it possible to enhance the potential and promote the individuality of each person involved.

colleagues, clearly define management objectives and prepare people for new challenges;

- The **Smart alliance - Relational gyms project**, an initiative developed within the framework of the Semester of the Elis Consortium School of Enterprise, pursuant to which twice a week, 3 people from the Group worked in the co-working spaces provided by the Consortium's member companies and participates in a programme of activities aimed at promoting creativity, innovation, well-being and developing networks among the participants.

In 2021, the **HR Special Projects Unit** designed specific initiatives, both internal and external, aimed at **enhancing the value of human resources**, contributing to the **improve the corporate climate** and promoting **corporate well-being and disseminating values such as sustainability and inclusion**, through active employee involvement.

The main projects were:

- **The Friday breakfasts**, a project designed to **create a channel for open and direct dialogue** between the CEO and Group staff and to share proposals and feedback on specific areas of interest. The meetings were attended by a sample of employees, selected on the basis of the main dimensions of diversity present in the company – age, gender, seniority in the company, educational qualification, position professionalism –, so as to ensure that different perspectives were adequately represented;
- **Acea Talks - Sustainable Conversations**, a format created with the contribution of a transversal work team designed to **raise the awareness of the Group's stakeholders on the issue of sustainability, through video interviews with well-known personalities from the academic, cultural, artistic, sporting and social world;**
- **Acea ti porta a Teatro** (Acea takes you to the theatre), a project set up in 2021 with the **Rome Opera House** to support art and pay tribute to employees with a video of artistic performances, created with the direct involvement of colleagues and top management, through which Acea has launched an important message combining art and sustainability;
- **Top Employers Certification**: the process for obtaining Top Employers certification began during the year, with the completion of the survey, prepared by the certifying body, aimed at collecting data and information in the company;
- **Christmas meeting** for executives, an event organised and held in collaboration with Acea's Sponsorship and Value Liberty and Communication departments and dedicated to the Group's top management and executives, who together reviewed what they had done during the year and shared their growth prospects for the future.

STAFF TRAINING AND DEVELOPMENT



169,522 hours of training delivered in **traditional**, **experiential** and **e-learning** form



training for the evolution of the Group's digital mindset continues: **1,185** persons trained in 2021



the **Digital Generation** project: **480** students from 12 high schools in Lazio, Umbria, Tuscany and Campania involved in **training courses** and **social and environmental sustainability projects**



Acea launches the **New Normal** training course: **REMOTE LEADERSHIP** for development of digital leadership to cope with organisational change

The **development of professional skills** is fundamental for the evolution of the Group and the achievement of its industrial objectives. In fact, it ensures the acquisition of adequate technical-specialist skills and the mandatory updating of compliance regulations (workplace safety, privacy, etc.), and **increases the company's competitiveness, by equipping it with innovative and strategic skills**, in response to emerging professional needs. Furthermore, via its training activities, Acea spreads knowledge of value, behavioural and leadership models within the Group, consistent with the company's vision and mission.

A **Group procedure** defines **roles, responsibilities and tasks in the management of training processes** for the development of expertise, knowledge and professional skills necessary to act in company positions. The process is divided into the following macro-activities:

- **identification of the training needs**, consistent with business objectives, centrally managed by the Holding Company, and **the definition of the guidelines and the budget** which orientate the training interventions of the year, taking into account **the specific**

ic training needs of each Group Company;

- **definition of the Operating Companies' Training Plan**, based on the specific needs identified (for example, **operating-technical**) and **Group** needs ("transversal" training);
- **administrative management and provision of training**, by the Parent Company's and the Operating Companies' Training Units.

Acea **funds training through its membership in interprofessional bodies for continuous training** - Fonservizi, Fondirigenti and For.Te. which the main Group companies belong to.

As in the previous year, the 2021 training courses were designed to be carried out mainly remotely, by means of "synchronous" training (live webinars) alternating with "asynchronous" training (recorded videos and e-learning courses).

The training course **New Normal: Remote Leadership** was held to support staff in managerial and coordinating roles to exercise leadership and remote management skills within the work team (See box)

THE NEW NORMAL: REMOTE LEADERSHIP COURSE

The objectives of the **New Normal: Remote Leadership** course are to recognise and address the **potential and new challenges of remote working** and improve the **ability to remotely manage work teams** (assignment of objectives, feedback, delegation processes). In 2021, the course involved managers, executives and employees with coordination responsibilities.

The **579 participants** tested the skills needed to develop digital leadership for dealing with organisational change and engaging people

who **work remotely or in a hybrid mode**.

The course was taught in **20 sessions totalling 4,039 hours of training** and addressed the **themes of leadership and people management** with the aim of:

- providing a **mindset for developing new ways of working**;
- enabling **collaboration between people**;
- making **teamwork effective**, even in **remote working scenarios**;
- supporting **employee development**, even remotely.

In 2021 management training courses were organised especially for **61 people that were assigned Individual Development Plans** on: Negotiation, Decision Making, Effective Communication, Relationship Care, Emotional Management, Motivational Leadership, Relationship Management and Communication, Economics and Project Management.

Training was also provided on **public speaking techniques** which involved **84 people who received a total of 1,080 hours of training**.

In addition to meetings in virtual classroom meetings, a **virtual mentoring activity** was provided during which participants were able to receive feedback with the goal of strengthening their public speaking technique.

Finally, **digitisation** training continued with courses aimed at the entire company population, for the dissemination of a new mindset and the growth of competencies and skills aimed at innovating industrial processes (see dedicated box).

TRAINING FOR THE EVOLUTION OF THE GROUP'S DIGITAL MINDSET

In 2021, the Group continued its **significant investment in digital skills** launched in 2020 through the training project **Digital Academy** and the definition of a framework of strategic digital skills for the Group, all assembled in Acea's "Digital DNA". In particular, during the year **10 training courses** were given with differing but complementary objectives, in which **1,185 people** participated.

8 training courses focused on strengthening specific **digital skills**, with the aim of introducing **new skills** and evolving the **organisational mindset**. In particular, the courses "Data Analytics" (39 hours of teaching and 59 participants) and "Data Lake" (4 hours of teaching and 53 participants) were organised to consolidate the **data-driven approach adopted by Acea**: the courses "Industry 4.0" (32 hours of teaching and 86 participants), "Internet of Things" (72 hours of teaching and 86 participants) and "Salesforce" (96 hours of teaching and 99 participants), on the **potential impact of new**

technologies on Acea's business; the courses "New Clients" (45 hours of teaching and 61 participants), "Service Design" (48 hours of teaching and 36 participants), "Agile PM" (66 hours of teaching and 41 participants) promoting the **adoption of a customer-centric strategy** through specific methods and digital tools that put the customer's needs at the centre.

Two other courses - "Development of Potential" (158 participants, 40 hours of teaching) and "Digital Culture" (10 hours of teaching and 506 participants) - focused on the **role of digital skills** and how they can **support the development of professional and personal skills**.

Finally, in December, the **new Digital a new Digital DNA survey was launched** in with the aim of understanding the effectiveness of the training actions undertaken and the actual evolution of Acea's digital skills.

Together with Acea SpA's Investor Relations & Sustainability Department and with the support of SCS Consulting, the second edition was held of the course "**Acting sustainably to make a difference**" to increase the **culture of sustainability in the Group**, by training new "Sustainability Ambassadors" in the various Group de-

partments and companies.

In 2021, **the first e-learning course aimed at the entire corporate population** (see box for more details), a **iso focused on sustainability**, was launched.

THE AZIENDA 2030 [COMPANY 2030] E-LEARNING COURSE

In 2021, **Azienda 2030** was the first e-learning course dedicated to sustainability issues aimed at the entire corporate population, created in collaboration with **ASviS** (Italian Alliance for Sustainable Development).

Approximately 3,300 people attended to learn more about sustainable development issues and the reasons and opportunities

underlying the adoption of business models oriented towards the **Azienda 2030 Sustainable Development Goals (SDGs)**.

The course, lasting a total of 3 hours, is divided into four modules: a) Towards sustainable economic development; b) New business models and opportunities; c) How to deal with change; d) Financial instruments for companies committed to sustainable development.

The training on the Group's **governance model** was provided in **e-learning mode** through the Pianetacea platform. It was aimed at the **entire company population**. In particular, a new training course called "Antitrust Regulation and Acea Compliance Programme" was launched, focusing on the model adopted by Acea.

Courses were also repeated on the legislation pursuant to Legislative Decree no. 231/01, concerning the Administrative Responsibility of Entities and the new Organisation, Management and Control Model implemented by Acea and on the Code of Ethics and the whistleblowing procedure, with the aim of completing the training of all personnel.

The Group Companies also carried out remote training independently, for example:

- **Acea Produzione** organised, with the training body SAFE, a training course on **energy efficiency** in industry, in which staff from Ecogena also participated, and a specialist training course on **company law**, in collaboration with the **Sole24Ore Business School**;
- **Acea Ambiente** trained its staff in **environmental regulations**, in particular to update the managers of its plants on the ARERA waste sector rules;
- **Aquaser** has trained the technical staff supporting the Director of Works in service and supply contracts;

- **Acea Elabiori** continued its **EPC Academy** training course, with accredited courses on **BIM (Building Information Modelling)** methodology for infrastructure design (see also the chapter on *Institutions and the Company*) and carried out extensive internal training on the **use of digitalisation and data analytics platforms such as ServiceNow, CO.SI., Qlik and Geo Community**;
- **Acea Energia** organised the **SalesForce course**, a cloud-based CRM solution for connecting with customers in an innovative way, **training on integrated SAS software** for managing data and generating reports and summary graphs, and training on **Lean Presentation Design** to acquire increasingly effective communication techniques. Finally, in the field of **energy management**, it has organised specialist training courses on imbalances in the electricity sector;
- Areti completed two strategic training projects, one on **LV Automation and Remote Control** and the other on **Smart Meter 2G** (the new second generation meters). In the area of **Compliance**, Areti delivered training modules on "Offences in public procurement", "Antitrust Regulation" and "GDPR Privacy". Particular efforts were made to train new recruits, both administratively and operationally, through the **Conosci Areti** training plan. Finally, a training project on "HV network - primary substations and protections" was organised and will continue in 2022;

- **Acea Ato 2** created the **Virtual Tour of the plants** project, designed with the aim of illustrating, by means of a virtual tour, company sites of particular interest, through realistic and immersive simulations, in a three-dimensional environment, wearing VR (Virtual Reality) visors; it organised training courses on **environmental issues**, with the aim of better managing the risks and opportunities arising from environmental impacts, **on the European Union's Taxonomy, on Environmental sustainability and the circular economy applied to integrated water and waste disposal processes and the reclamation of contaminated sites**;
- **Acea Ato 5** oversaw, in particular, the Integrated Quality, Environment, Safety and Energy **Management System**;
- **AdF** continued to **consolidate the agile culture in the company**, both through technical training and through experiential training, carried out outdoors and aimed, in particular, at new recruits. The Company has trained all its staff in Legislative Decree no. 231/01, Antitrust and Sustainability;
- **Gesesa** has provided training to all company personnel, including senior management on **environmental, technical and operational issues** and on Legislative Decree no. 231/01. Managers continued with the **"Leadership & People Management"** course,

launched in 2020 and aimed at enhancing their managerial style, in particular by delving deeper into issues concerning relationship with their staff, effective communication, time management and decision making.

The **traditional and experiential training activities** and those provided on the **e-learning platforms** provided a total of **886 courses** (587 in 2020), amounting to **1,657 editions**, in which **5,029 people** took part in total, of which 26% were women.

A total of **169,522 hours** of traditional, experiential and e-learning training was provided - a significant increase (+93%) compared to 87,672 hours in 2020 (see table 44).

The **total training hours per capita**¹⁰⁹ are **26** (13 in 2020). When analysing data from a gender perspective, the hours of training per capita provided to male staff amounted to 26 and those provided to female staff amounted to 25. The breakdown by qualification is as follows: 10 hours for managers, 37 for executives, 24 for employees and 27 for other workers.

The **overall costs incurred** for the provision of the courses, net of scheduling for training and the preparation of the spaces allocated to it, were equal, in 2021, to **€ 1,995,848**.

Table no. 44 – Training (2020-2021)

TRADITIONAL AND EXPERIENCE-BASED TRAINING COURSES

| course type | courses (no.) | | training (hours) | |
|---------------------|---------------|------------|------------------|----------------|
| | 2020 | 2021 | 2020 | 2021 |
| managerial | 13 | 21 | 11,108 | 14,749 |
| safety | 65 | 250 | 10,059 | 58,164 |
| governance model | 29 | 34 | 3,031 | 4,260 |
| operating-technical | 468 | 571 | 41,442 | 53,575 |
| total | 575 | 876 | 65,640 | 130,748 |

TRAINING COURSES PROVIDED THROUGH THE PIANETACEA E-LEARNING PLATFORM

| | | | | |
|---|-----------|-----------|---------------|---------------|
| whistleblowing | 1 | 1 | 804 | 2,762 |
| general training | 1 | 0 | 480 | 0 |
| Code of Ethics | 1 | 1 | 6,740 | 590 |
| antitrust law | 1 | 1 | 977 | 8,643 |
| unlawful business practices | 1 | 0 | 1,170 | 0 |
| project management | 1 | 0 | 454 | 0 |
| administrative liability of entities (Legislative Decree no. 31/01) | 1 | 1 | 2,426 | 590 |
| safety | 3 | 2 | 5,585 | 464 |
| QASE management systems | 1 | 1 | 1,982 | 358 |
| Legislative Decree no. 202/05 | 1 | 1 | 1,414 | 475 |
| Sustainability and Agenda 2030 | 0 | 1 | 0 | 16,836 |
| Digital Culture | 0 | 1 | 0 | 8,056 |
| total | 12 | 10 | 22,033 | 38,774 |

BREAKDOWN OF TRAINING HOURS BY QUALIFICATION AND GENDER

| title | 2020 | | | 2021 | | |
|------------------|---------------|---------------|---------------|----------------|---------------|----------------|
| | men | women | total | men | women | total |
| executives | 631 | 157 | 788 | 724 | 149 | 873 |
| managers | 8,090 | 3,746 | 11,836 | 13,062 | 6,277 | 19,339 |
| clerical workers | 34,473 | 20,548 | 55,021 | 63,614 | 32,609 | 96,223 |
| workers | 19,976 | 51 | 20,027 | 52,952 | 135 | 53,087 |
| total | 63,170 | 24,502 | 87,672 | 130,352 | 39,170 | 169,522 |

NOTE: Training hours do not include training provided to staff who left the company during the year.

109 The indicator was calculated by comparing the number of hours attended with the total number of employees.

In 2021, a structured process was established to define a **methodology** which led to **identifying the areas of intervention and tools for constructing development paths** for Group employees (see the relevant box); the **first editions of development paths**, including **training and focus team coaching courses** defined in the individual plans, sharing the results through reports for the various

stakeholders involved.

Following the analysis of the needs that emerged, within the context of the individual development plans that were designed, three advanced training courses were identified and realised through participation of executives in the EMBA Masters degree programme at the University of Tor Vergata.

INDIVIDUAL DEVELOPMENT PLANS

The methodology for the construction of targeted development paths was developed in 2021. It provides for individual plans and the definition of a detailed catalogue, through the design of specific paths based on the competences to be developed, with a view to innovation and continuous improvement. These include tools and areas of intervention.

18 types of interventions and development tools were designed, divided into: **9 types of training courses**, **6 types of focus team**

coaching (on employee management, strategic thinking decision making effective communication, peer relations and change management), **individual coaching courses**, mentoring for both mentors and mentees, supported by specific training on methodology and process and, finally, **high-level training**.

14 editions of focus team coaching involving 64 people were launched in 2021.

Additionally, **projects were begun to train and develop the potential of new hires**. These initiatives, carried out by the Parent Company with various Group companies, **involved around 300 people who were given a self-descriptive personality test**, the results of which could be shared and submitted. Following the administration of the test, **individual and summary reports** were produced with aggregated data on the population involved in terms of strengths and areas for improvement. These documents, which provide useful insights for the development of potential, were shared with process stakeholders and participants.

Professional development of staff through **promotions** in the year concerned **804 people** of which 215 were women, i.e. 27%.

COLLABORATION WITH UNIVERSITIES AND HIGH SCHOOLS

Acea develops **partnerships and cooperation with universities**, participates in studies and research, meetings between companies and students and stipulates agreements to promote internships and apprenticeships. Acea consolidated relations with the Tor Vergata, La Sapienza, LUISS Guido Carli, Studi Europei di Roma, Federico II di Napoli, Lumsa, Scuola Superiore Sant'Anna di Pisa, Università degli studi della Tuscia, Cassino universities and Politecnico University of Milan via the **conclusion of agreements** aimed at encouraging the transition of graduates into the working world. Despite the ongoing difficulties caused by the health emergency, in 2021 Acea **renewed the agreements for curricular and extra-curricular internships** with the Universities of "Roma Tre", "Tor Vergata", "La Sapienza" and LUISS Guido Carli. Acea also concluded specific agreements for the master's degree programme in "Procurement Management – Procurement and Tenders" and the Maris master's degree programme in "Reporting, Innovation and Sustainability", both created by the Faculty of Economics of the "Tor Vergata" University in Rome. Acea has also initiated **new contacts and relations with the placement departments** of the Alma Mater Studiorum University of Bo-

logna, the Politecnico University of Turin, the Aldo Moro University of Bari, the University of Camerino, the Parthenope University of Naples, the University of Pisa and those of Palermo, Catania and Messina. Finally, during the year, a scientific cooperation agreement was signed with the Department of Earth, Environmental and Resource Sciences of the University of Naples Federico II and with the Vesuvius Observatory for the design and implementation of a hydrogeological and microbiological monitoring network for groundwater.

Thanks to these interactions, in 2021 Acea established **76 training internships** and **27 curricular internships**. It hired **15 young graduates** and stabilized the positions of **21 young people** previously holding internship positions.

The Company also utilizes the **professional skills** of its staff in university master's degrees and courses and for **technical projects**. In 2021, qualified **company staff** worked as teachers or provided corporate testimonies for **university master's degrees**, covering, in particular, issues related to energy, the **environment, sustainability** and **innovation**. In particular, **Acea** has collaborated with **SAFE**, a centre of excellence for studies and training on issues related to energy and the environment, with the LUISS School of Technological Innovation, dedicated to Digital Talents, signed an agreement with the 42 Roma LUISS School of Technological Innovation dedicated to Digital Talents and took part in the 'Digital Open Innovation and Entrepreneurship' graduate programme together with the Campus Bio-Medico of Rome.

Acea also concludes agreements with **high schools** for school-to-work projects such as the **H2SchOOl** project launched by Gesesa in 2021 with local high schools and commercial schools in the country. **GenerAzione Digitale** [Digital Generation] (see dedicated box) was an important project implemented by Acea in 2021, involving both support to and collaboration with schools, through the contribution of Group companies.

THE GENERAZIONE DIGITALE PROJECT

The **GenerAzione Digitale** project involved about 480 students from **12 high schools** in Lazio, Umbria, Tuscany and Campania, with the aim of promoting the Group's commitment to projects that raise awareness of sustainability among the younger generations, encouraging a virtuous exchange between schools and companies, based on the creativity of students and their experiences in the workplace.

The 2021 format, focusing on "**The protection of natural ecosystems in a sustainable and innovative way**" has been conceived as a creative marathon, the "**Digital Creathon**" during which students, supported by the ELIS team facilitators and the "Sustainability Ambassadors", developed innovative ideas and creative solutions digitally.

The 3 winning project ideas of the 'Digital Creathon' were developed by:

- the **Nefti** team with its project '**For a more useful Tiber**', for the production of electricity using water from the river;
- the **ECOciqua** students, who created an **app and an eco-bin system** for smart urban waste management;
- the **Rest@rt** Team, which has designed a **mapping of electric charging stations** to make charging more efficient, and a **virtual currency**, the carbon point, to encourage both plastic recycling and the use of electric cars.

In addition, as part of the initiative, Acea worked on realising the **I-School** team's **Intelligent School project**, which envisages the adoption of a school in which interventions will be carried out to transform the school premises into an **eco-sustainable, self-sufficient** place.

INCENTIVE SYSTEMS AND STAFF EVALUATION

The **Performance Management System** is governed by corporate procedures and is the operational application of the **Leadership Model**. Its purpose is to **enhance personal contribution to the Group's performance**, including through the achievement of expected individual objectives and adherence to the Leadership Model.

The **remuneration policy** adopted envisages short-term and long-term fixed and variable remuneration measures (MBO, LTIP).

Following the expiry of the 2018-2020 long-term incentive plan, paid in 2021, a **new Long Term Incentive Plan (LTIP) was introduced, covering the three-year period 2021-2023**. This plan covers only the **Chief Executive Officer, the Executives with Strategic Responsibilities and other Executives holding key positions** in the Group.

The new Plan is divided into three cycles, at the end of which a monetary bonus will be paid, if the objectives are achieved; the accrual of any **three-year cycle** bonus is aimed at guaranteeing the continuity of the company's performance, steering the management towards results with a **medium and long-term outlook** that are consistent with the Group's Strategic Plan. The **calculation system is subject to the degree of achievement of objectives** as determined by the Board of Directors after consulting the Appointments and Remuneration Committee, **of an economic-financial nature** (NFP/EBITDA and NFP/NP), linked to the profitability of the share (EPS) and, as a novelty introduced with the new Remuneration Plan, these results are linked to the **Group's sustainable success** in the medium to long term as measured by a **composite sustainability indicator** which has been given a percentage weighting in line with market best practices. To this end, it should be noted that the **ESG objectives envisaged are in line with the Group's strategic, industrial and sustainability planning**.

The **short-term (annual) incentive system, Management by Objectives (MbO)**, has also been revised, starting in 2021, for consistency with best market practices, to make it fairer and easier to communicate and assess. The MbO is applied to **top and middle management** and entitles them to receive a monetary bonus based on the achievement of set targets. The system is divided into **Group objectives** which are the same for all involved parties, **Area objectives** (applicable across the relevant Area) and **individual objectives**. The **Group objectives** that are applied to 100% of the recipients of

the MbO incentive scheme, are based on **four indicators (KPIs)** three of an **economic-financial nature** (EBITDA, net profit, net financial position) and one **composite sustainability indicator**. Managers can choose their **Area objectives** from among those included in the **Dedicated catalogue**, with a direct link to the company's strategy and operational management.

With the introduction of sustainability objectives in the incentive systems for the MbO population and for top management (LTIP), Acea has confirmed the **integration of sustainability** into business activities, strengthening the **link between remuneration mechanisms and the achievement of social and environmental objectives**.

Employees who are **executives, clerical and manual** workers including those with part-time, fixed-term (including temporary) and apprenticeship contracts, are **eligible for the performance bonus every year**. This is a variable payment, linked to qualitative and quantitative results achieved in the realisation of company objectives, which aims to have workers **participate in company processes and projects** to increase the company's profitability and improve competitiveness, productivity, quality and efficiency.

There are also **benefits** for employees, including those with part-time, fixed-term contracts and apprenticeship contracts, such as **meal vouchers**, a discounts on electricity tariffs (for staff hired before 9 July 1996), the subsidies provided through the Company Recreational Club (CRC) and a **supplementary health insurance** policy. Other forms of benefits are provided to staff to support their **well-being**. These include: contributions for dental expenses, health check-ups, contributions for the use of emotional and physical well-being services. Executives are also entitled to specific benefits, such as the use of a company car and the reimbursement of fuel costs, etc. Finally, a policy is in place for all staff members which, in the event of death, provides a monetary payout to beneficiaries.

INTERNAL COMMUNICATION

At Acea SpA, the **Internal Media Relations and Communications Unit** handles communication to employees and contributes to **promoting the Group's principles, values and strategic objectives** and developing a **shared company culture**.

Digital platforms continued to play a central role in the communication between companies and people in 2021 as well.

Of particular note is the **My Intranet** portal, a digital environment

dedicated to staff, which aims to strengthen the Group's cultural identity by facilitating access and information sharing. In order to make the portal more and more inclusive, a number of **features have been optimised** during the year such as the release of a new, better performing version of the **search engine, integration with third party tools** (Teams and Forms) and the activation of the Single sign on all SAP platforms.

In addition, **a digital ecosystem was created with the launch of three new operational portals** for the Water, Energy Infrastructure and Engineering & Services industrial areas.

My Intranet has been enriched with **3 new sections - Welfare, Organisation, Stakeholder Engagement** - and has featured important **initiatives and events**, including the Acea Green Cup, the Sustainability Day, the Connect with Acea and Prevent with Acea programmes, confirming its position as the place where the Group's people can engage. The section dedicated to **anti-contagion measures** implemented by the Company for its employees has also been constantly updated.

The massive use of digital working methods has led to a parallel increase in cyber threats and attacks. A newsletter has therefore been produced and is available in **My Intranet**, in the section dedicated to **IT security, to raise staff awareness of the issue and the correct use of IT tools**.

In May, the **Acea Ti Premia** [Acea rewards you] portal, the Group's innovative digital meeting venue, was integrated with My Intranet and **became accessible from any device** (PC, smartphone and tablet). It is a venue that encourages engagement, where employees are able to share projects, events and company gadgets. The portal also makes it possible to improve the way in which company benefits are allocated by making them more transparent and democratic, through random allocations and the gamification.

The **Acea4You App** was designed to plan office attendance, avoid crowds, and book Covid-19 vaccination or serological tests, meals or canteen space and Christmas parcel collection and was widely used.

In 2021, internal communication initiatives remained in line with the pillars of strategic planning: **sustainability, welfare, safety, engagement, solidarity and innovation**. The **Connessi con Acea** [Connect with Acea] was created to help keep communication between company employees alive, despite their physical absence from the workplace. The project, devised by the Communication Function, involved the organisation of two digital events - "Work challenges during the pandemic: Acea's responses" and "Sustainable by vocation: the Acea Group experience" - during which current issues related to the Group's activities were addressed with the contribution of qualified experts and employees. The events were simultaneously translated into sign language by professional interpreters associated with ANIOS (Association of Italian Sign Language Interpreters).

Again with a view to strengthening the group spirit and sense of belonging, the **Acea Green Cup 2021** initiative was launched in June with an intra-group contest on the most sustainable projects carried out by the companies that participated, in September, in a regatta held for staff only (see the chapter on "Customers" - paragraph Communication, events and solidarity).

The second phase of **Proteggo l'Azienda che mi protegge** [I protect the company that protects me], the internal communication campaign promoted by the Ethics Officer with the aim of promoting the dissemination and knowledge of the values enshrined in the Code of Ethics and the tools to protect them, was unrolled in 2021. In

addition to the dedicated training course and the "Comunica Whistleblowing" platform, a number of awareness-raising videos on the articles of the Code of Ethics were produced, involving managers and employees.

The Communication Function supported the implementation of numerous initiatives devised by the Human Resources and Sponsorship Functions & Value Liberality, also in collaboration with the corporate CRA, on **corporate welfare, wellbeing and inclusion** in continuity with 2020, including: **Wellness Fridays**, the **Acea and Fondazione Policlinico Gemelli** webinar, the **Acea Camp** and **My Camp** summer centres for the children of employees, the **Orientiamoci**, a webinar created to guide employees and their children into the professional world and the **Acea and Fitprime** programme: **Insieme per il benessere** [Together for well-being] (see also the paragraph on *Diversity, inclusion and welfare*).

Also of note:

- the project **Insieme per la parità di genere e contro la violenza sulle donne** [Together for gender equality and in opposition to violence against women], was launched in 2020 with a dedicated webinar and continued in 2021 with the dissemination of video clips designed to raise people's awareness of these issues and of how gender stereotypes and prejudices are rooted in cultural models and can influence everyday life. At the end of the initiative, on the occasion of the International Day for the Elimination of Violence against Women, a video message from Acea's top management in support of the project was released;
- this path is dedicated to the themes of **Diversity & Inclusion** and its purpose is to promote a cultural change towards valuing diversity at all levels of the organisation. The first stage of the process involved an internal survey to determine employees' awareness and perception of the issue;
- the **Previeni con Acea** [Prevent with Acea] project to promote a culture of wellbeing and prevention, with a communication campaign aimed at raising awareness of the importance of health, prevention and healthy lifestyles. In particular, two webinars were organised to explore prevention issues and an online and offline communication campaign was implemented (intranet, digital totems and lift monitors at headquarters). Acea has also carried out preventive screenings in collaboration with **Susan G. Komen Italia** (see the section *Diversity, inclusion and welfare*).

Solidarity has always been a fundamental value for Acea, which, in 2021, expressed it together with the protection of health and safety by creating the **Acea Vaccine Hub** (see also the paragraph on Occupational health and safety). In this context, the Communication Function, in coordination with the Human Resources Function, collaborated on the implementation of the **campaign to raise awareness of the Covid-19 vaccination**, which involved sending out emails and setting up visual communication on digital totems.

Still on the subject of solidarity, a completely digital version of **Acea's Solidarity Mondays** continued in 2021. This effort involves employees in supporting charitable activities (Taxi Solidale, AISM, Banco Alimentare, Medici senza fissa dimora, Un...due...tre...Alessio).

Finally, as a sign of its support for scientific research, Acea renewed its partnership with the **Telethon Foundation**, with **6,700 Christmas gifts**, delivered to Acea Group employees and partly donated to the Community of Sant'Egidio to support its activities in favour of those most in need.

To survey staff opinions and requests, the Communication Function ran a **survey** on:

- **smart working** - in collaboration with the Human Resources Function a **questionnaire** was circulated concerning the working methods implemented by the Group in the face of the new emergency scenario;
- **Diversity is a fact, inclusion is an active choice**, a widespread survey to promote a cultural change in the Group aimed at valuing diversity;
- the **Acea work lab**, in collaboration with the Human Resources Function, to determine how employees view the new ways of working and sharing space;
- the **Digital selfie**, in collaboration with the Training Unit, designed

to map and enhance the technical skills of all Group employees; At the end of the year, at Christmas, a video made by top management was released to wish the employees happy holidays and thank them for their efforts during the year. Also the **Acea Christmas Contest** involved a culinary challenge in which employees reproduced the eco-sustainable recipes of the "La sostenibile leggerezza del gusto" [The sustainable lightness of taste] cookbook, created especially for Acea on this occasion in collaboration with the Italian Federation of Chefs.

The attempts at making the recipes were voted on and a ranking was drawn up, which was then submitted to a jury of chefs from the Italian Cooks Federation who decided on the winners.

DIVERSITY, INCLUSION AND WELFARE



signed the **Protocol on Diversity & Inclusion** with trade unions and defined the **Diversity & Inclusion Plan for 2021-2022**



Acea's rating in the **Gender Equality Index di Bloomberg** improves: **80.67/100**



the **"Sostegno Donna"** counselling service and the **"Mi prendo cura di te"** caregiver service have been set up



in collaboration with Susan Komen Italia: **342 free preventive screening** provided

Inclusion, protection of diversity (gender, age, disability, religion, race, etc.), **combating sexual harassment and mobbing are issues that are monitored at the governance level**. Indeed, Acea has a Code of Ethics and an active **Ethics and Sustainability Committee**, which, among other things, has the responsibility of assisting the Board of Directors in matters of **diversity**, with the task of **promoting the culture of valuing diversity and combating all forms of discrimination**.

Acea is one the signatories of the **"Utilitalia Pact – Diversity makes the Difference"**, drafted by the Commission for the Management and Promotion of Utilitalia's Diversity, and has adopted a Group procedure on the **"Protection, inclusion, promotion of the diversity and well-being of workers"** and, in 2020, signed the **CEO Guide to Human Rights** by the World Business Council for Sustainable Development (WBCSD).

In 2021, the company was particularly committed to promoting the principles of including people and valuing diversity, as well as pre-

venting and combating all forms of discrimination. To this end, two important initiatives were implemented:

- the signing, with the social partners, of the **Protocol on Diversity & Inclusion**, operational at Group level, to enhance diversity and combat all forms of discrimination in the workplace. The Protocol proposes to implement concrete measures, improving existing legal provisions, to **foster parenthood** (e.g. leave of up to 12 days as compulsory leave for fathers), **support women who are victims of gender-based violence** (e.g. provision of an additional period of paid leave of 90 days), counteract any gender gaps and foster the inclusion of the disabled (see also *Industrial Relations*);
- the definition of the **Diversity & Inclusion Plan for 2021-2022**, aimed at defining a programme of initiatives addressed internally, with actions dedicated to **employees**, and externally for the development of projects on the subject of D&I, in synergy with other corporate Functions, with an impact on customers, the territory and institutions (see in-depth box).

ACEA INITIATIVES IN RESPONSE TO EMPLOYEES' REQUESTS CONCERNING DIVERSITY & INCLUSION

In 2021 Acea developed the **2021-2022 Diversity & Inclusion plan**. To this end, employees participated in a **survey** to collect data on the level of knowledge of the topic, **assist the company in undertaking initiatives in line with the real needs of employees**, facilitate the **dissemination of a culture oriented towards valuing diversity & the inclusion of people**.

Based on the survey results, initiatives were defined and implemented during the year in the areas of training, communication, monitoring and support, including:

- the development of a section of the **dashboard dedicated to D&I**, with the definition of specific **indicators** for measuring and analysing trends relating to variables of interest (gender, age, disability, etc.) across all processes of the employee journey, from entry into the company to exit;
- the **Corporate Family Responsibility** programme, which included **4 webinars** aimed at all Group employees, to provide support on issues related to parenting, how to take care of loved ones, the use of social networks and how the relationship between adults and adolescents is evolving. In particular, the "*Tienilo Acceso*" [keep it going] webinar, conducted as part of the broader event dedicated to inclusion and diversity promoted by TIM called **4week4inclusion**, featured sharing and testimony on how diversity, if recognised and valued, can become a strategic factor for people and for the company;
- the creation of the **Equality & Care intranet section**, which includes an **area dedicated to Diversity & Inclusion**, was designed to disseminate the D&I culture, make thematic documents accessible to employees in a structured repository, and disseminate information and communications on initiatives and commitments undertaken by the company on the subject;
- the project **Together for gender equality** with the aim of raising awareness on gender equality and combating violence against women, with webinars, short video tutorials and the activation of a support service;
- participation in the **DNA Inclusive Job Day**, a career day dedicated to high-school and university graduates belonging to protected categories, during which Acea interviewed over 20 people. The event aimed to promote the leveraging of differences and the dissemination of inclusive business and organisational models. It consisted of three parts: a training workshop to acquire and share good organisational practices in the area of diversity, presentations by participating companies of their inclusion policies, and a space dedicated to direct interviews between participating companies and candidates. Following the interviews, **one candidate was selected and started her career at Acea**;
- the development of the new **'job advertisements' editing**, with the definition of new layouts of job descriptions published externally with a specific announcement: *«Acea promotes the inclusion and enhancement of the individuality of each person involved in its selection processes by combating any form of discrimination.»*;
- training of staff on the concept of unconscious bias** to provide useful tools for promoting the value of diversity in the company and encouraging inclusive management of working relations. The project, which started in December, **involved 5,190 people, who were made aware of cognitive biases and widespread prejudices**, their impact on organisations and the possible resistance that hinders the establishment of an inclusive culture.

Acea adopts reconciliation measures to support parenting, strengthened thanks to the Diversity & Inclusion Protocol mentioned above, such as parental leave for family reasons for working mothers or working fathers, **paternity leave**, with the addition of two extra days of paid leave, to be taken within two months of the birth, adoption or fostering of a child; the **hourly permits for the enrolment of children at nursery school, kindergarten and the first day of primary school**.

In 2021, the company once again participated in the **Sistema Scuola Impresa** [Business School System] project, coordinated by the Elis consortium, helping to create the "*Inspirational Talks Role Model*" initiative: a programme for the promotion of **STEM** (Science, Technology, Engineering and Mathematics) training programmes among **female middle and secondary school students**. This year's project involved 15 female Acea Group professionals who, as role models, recounted their experiences of professional success in male-dominated sectors and sent a message of encouragement to the younger generation about the possibility of realising their professional dreams. Acea also participated in the **Nastro Rosa 2021 campaign** on the importance of breast cancer prevention and the **International Day for the Elimination of Violence against Women**. (see the chapter Customers, Communication, events and solidarity).

Acea participated in the Bloomberg Gender Equality Index (GEI) again in 2021. This index measures gender equality in terms of five areas: female leadership and talent pipeline, wage parity and equality between the sexes, inclusive culture, sexual harassment policies

and promotion activities aimed at women. The assessment is **positive and equal to 80.67** (on a scale of 0-100), a **clear improvement on the 2020 assessment (70.49) and above the averages for the sector (71.21) and the sample analysed (71.11)** (see also chapter Shareholders and Investors).

Acea actively promotes corporate well-being, starting with the **needs of its staff**, which are determined over time through surveys. The **Group Welfare Plan** was enhanced in 2021, identifying six fundamental pillars relating to health, **work-life balance, emotional and physical wellbeing, supplementary pensions, income support measures and family**.

The income support measures include the option to **convert the performance bonus into welfare services** (flexible benefits) through the **My Welfare platform**, enriched with a wider range of **personal and family services** (family services, travel, transport, health and health insurance, supplementary pensions, sport and leisure, etc.). To promote the Welfare Plan, in 2021 numerous **information meetings** were held remotely and a variety of **training videos** were shared. Acea has **reused part of the tax relief**, enjoyed thanks to the Welfare Plan, **for the benefit of all employees** through the payment of an **additional amount** for those who allocate their performance bonus to supplementary pension schemes, **complementary social security** and by offering preventive health services and campaigns promoting primary and secondary prevention and healthy lifestyles as well as making an economic contribution the **provision of services for the psycho-physical well-being and physical well-being of employees and their families**.

Among the numerous **welfare initiatives** undertaken during the year, Acea:

- organised the **"Previeni con Acea"** [prevent with Acea] campaign, to raise awareness of the importance of health, prevention and the adoption of healthy lifestyles among employees. To this end, **in collaboration with the Fondazione Policlinico Universitario Agostino Gemelli IRCCS and the Bambin Gesù Children's Hospital, two webinars have been organised** on: *"Covid-19 and the lungs: a lesson for the future"*, *"The role of the microbiota in the digestive system"* and *"The Sars-CoV-2 Pandemic in Italy"*; a three day event was organised in collaboration with Susan G. Komen Italia, during which **342 breast, dermatological and endocrinological screenings** were carried out free of charge, with around 600 requests received, and employees were offered **free cardiological, urological and gynaecological check-ups and clinical tests**, as well as the possibility of using the telemedicine service in collaboration with the CRA;
- deployed the **"Sostegno Donna"** (Support for Women) to offer a direct channel of assistance to those who need to talk to selected professionals, also offering the possibility of undertaking specific counselling, psychological, psychotherapeutic, pedagogical and parenting support courses;
- developed **"Mi prendo cura di te"** [I take care of you], a caregiver service, totally free of charge, aimed at providing personalised advice and guidance with a professional (the care manager) in the management of educational and/or social care needs (support services for the elderly and people with disabilities, services to support children, specialised services with the availability of psychologists, nurses, physiotherapists, etc.);
- rolled out the **wellness programme 'Acea and Fitprime: together for wellbeing'**, aimed at promoting physical and nutritional wellbeing and encouraging the adoption of a healthy lifestyle by practising sport, taking part in live streaming and on-demand courses on the Fitprime platform and customising one's diet plan with a nutritionist;
- the **"Wellness Fridays"** programme was launched on World Food Day in association with the HR Community to promote healthy lifestyles, sharing the importance of prevention and healthy eating;
- actions in support of parents** to encourage a better balance between work and childcare, such as the summer camp for boys and girls aged 6 to 14, created with the aim of promoting the values of sport among the younger generations, and the **webinar on career guidance**, aimed at parents and children aged 17 to 22.

Finally, also in 2021, the solidarity and food support project **Solidarity Taxi** was promoted in the Rome area in collaboration with the **ACLI of Rome** with the aim of providing concrete help to the **neediest families** and those most affected by the pandemic. The project involved the **donations of parcels containing food and medicine by employees**, and **former employees contributed by driving** a Fiat Doblò, loaned free of charge by Acea, to deliver the solidarity parcels in the municipality of Rome. A total of **8,604 parcels** were distributed, **4,552 shopping coupons** and **200 school kits** were donated to **4,969 families**. Overall, **the effort reached a total of 16,785 people of which 4,675 minors**.

In compliance with the law¹¹⁰, there are **employees belonging to protected categories** (disabled, orphans, etc.) who are guaranteed support services, assistance and technical support tools to facilitate the

performance of the tasks entrusted to them. In 2021, **206 employees** (124 men and 82 women) belonged to protected categories. In the year under review, there were no cases of discrimination against Group employees in Acea.

COMMUNITY LIFE AT ACEA

Some structures perform work of a social nature, directly involving employees: the Company Recreational Club (CRC), the Gold Medal Association and the Association of Christian Italian Workers (ACIW). **4,450 members** are enrolled in the Company Recreational Club in 2021, including executives.

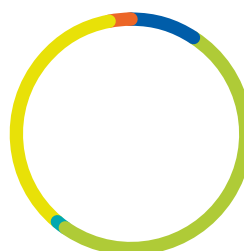
The CRC was responsible for **managing the company's crèche**, open to children of employees and children of residents of Municipality I, and accommodating 20 children in the first half of 2021 and 25 in the second half.

The Club **offers cultural, sport, tourism, economic, commercial initiatives and personal services**, and its aim is to enhance the free time of its members, without losing sight of aspects of social interest. An important solidarity tool among employees is the **Emergency Fund**: an initiative **in support of the relatives of deceased**, in-service or retired employees. All employees can join by signing a form, which they must send to the Human Resources Function or to the CRC, in which they authorise the deduction from the payroll of a small contribution that is allocated to the Fund.

The Company Recreational Club enters into **agreements** for employees and their families with institutions that offer health services, dental services, legal advice, etc. and active commercial agreements, sports ticket sales, theatre and music events, which can be viewed on a dedicated portal with constantly updated contents and accessible on the Intranet (www.cra-acea.it). It is also responsible for informing employees, by sending newsletters.

The Association of Christian Italian Workers (ACIW) is very active in Acea and **promotes social initiatives, solidarity and support**. Examples of that support are the presence of the Chaplain from whom employees can seek guidance, and the organisation of meetings for families, also with the intention of creating a **support network** for employees. The association is also involved in **providing services** such as **mortgage and loan advice, school assistance** for children of employees attending lower and upper-secondary schools, and various other initiatives benefiting employees, such as the organisation of language courses and cultural and sports activities. The ACLI (Association of Christian Italian Workers) was very active in 2021 as well, **in its support for initiatives of social value in the local area** (Banco Alimentare [food bank], Caritas, etc.).

Chart no. 47 – Members that have used CRC services (2021)



209 members utilized tourism services

1,145 members interested in insurance instalments

35 members interested in purchase instalments

811 members utilized the so-called "dono della Befana" bonus benefits

64 members utilized scholarships

SHAREHOLDERS AND INVESTORS

Through the **Investor Relations & Sustainability Function** and in cooperation with the competent corporate structures, as a listed issuer, Acea **provides the financial community** with a flow of continuous, timely and useful information for a **correct assessment of the Group's current and prospective situation**, with a greater emphasis on **ESG elements** (Environmental, Social, Governance) that are increasingly integrated with financial aspects. The information is conveyed through current and potential **direct relationships** with analysts and investors, and through **specific communications** (price-sensitive press releases, company presentations, credit ratings, stock performance, highlights, etc.) that are made available on the institutional website (www.gruppoecea.it), respecting the fundamental principles of **propriety, clarity and equal access**.

Additionally, working with the competent structures, the Corporate Affairs Function is responsible for the management of information flows with the **Supervisory Authorities** (Consob and Borsa Italiana) and the corporate obligations required by law for listed companies.

ECONOMIC FLOW TO SHAREHOLDERS AND INVESTORS

For shareholders, at the Shareholders' Meeting, the Board of Directors proposed the distribution of a dividend of € 0.85 per share (+6.3% on the € 0.80 in 2020), equivalent to € 180.6 million received (having been € 170 million in 2020), which correspond to a payout of 58% on net income, after allocations to third parties.

In 2021 **Acea performed well** on the Exchange with the share price increasing by **9.4%**. The share price rose from € 17.15 at the beginning of 2021 to € 18.76 on 30 December 2021 (the last stock exchange session of the year) with a capitalisation of € 3,995 million.

The maximum value of € 21.30 was reached on 18 June, while the minimum value of € 16.12 was reached on 3 March. During the year, the **daily average volumes** traded were above 120,000 shares (compared to 165,000 in 2020).

Table no. 45 – Performance of stock exchange indexes and Acea shares (2021)

| | % change 31/12/2021 (vs 31/12/2020) |
|-----------------------|--|
| Acea | +9.4% |
| FTSE Italia All Share | +23.7% |
| FTSE MIB | +23.0% |
| FTSE Italia Mid Cap | +30.8% |

€ 97.4 million are allocated to **financing** stakeholders (compared to € 98 million in 2020). The average overall all-in cost of the Acea Group's debt on 31/12/2020 was 1.42%.

Regarding **the composition of medium/long-term** debt consolidated as at 31/12/2021, approximately 85% of the total amount derived from transactions on the capital market (corporate bonds). Regarding the banking sector, the Group mainly deals with entities whose mission is **to finance strategic infrastructure**, such as the European Investment Bank (EIB, 6.1% of the consolidated debt) and the Cassa Depositi e Prestiti (CDP, 3.6% of the consolidated debt). These Institutions ensure loans, to entities with creditworthiness such as Acea, with a maturity of more than 10 years, in line with the duration of the concessions (water and electricity) owned by Companies of the Group called to make the relevant investments.

THE FIRST ACEA GREEN BOND

In January 2021 Acea issued its first **Green Bond** against a total value of € 900 million as a development initiative towards greater integration of sustainable finance tools, in line with its **industrial and sustainability plan 2020-2024**, which is focused on achieving the objectives of the 2030 Agenda.

The Green Financing Framework constitutes the basis of the Green Bond. The Framework was drawn up by Acea's Finance, Planning and Control and Sustainability Functions as a document for informing investors about the use of the proceeds raised for industrial projects that are significant in terms of sustainability. Green projects eligible for Green Bond financing are selected across four areas of activity that are consistent with the goals of the 2030 Agenda:

water resource management; energy efficiency; the circular economy, green energy. The progress of investments and underlying projects will be **monitored and reported** on as a guarantee of the commitment made to lenders with the Acea Green Bond, which has now received **ISS certification**.

Acea's first green bond initiative has been very well received by the market, as is evident from the fact that the number of applications was **7 times higher than the offer**; Acea obtained a price premium (greenium) compared to a traditional issue and, in the first case ever recorded for corporate issues among Italian listed companies, the bond has a **negative yield** for the 5-year tranche with a consequent reduction in the interest paid by Acea.

AGENCY RATINGS

Table no. 46 – 2021 rating

| agency | long-term rating | short-term rating | outlook |
|---------|------------------|-------------------|---------|
| Moody's | Baa2 | | stable |
| Fitch | BBB+ | F2 | stable |

The **Moody's** and **Fitch** agencies confirm, with their latest ratings, their respective ratings on Acea. They highlight the appreciation of the Group's strategic focus on regulated businesses, the positive performance trend and the good level of available liquidity, all of which offset the increase in debt linked to investments in innovation and sustainability of the 2020-2024 Business Plan.

FINANCIAL DISCLOSURE

During the year Acea participated in **numerous "virtual" events** (meetings, extended presentations, investor conferences, roadshows and reverse roadshows), **meeting with about 240 buy-side investors and analysts (both equity and credit)**.

Conference calls and webcasts were held for the approval of annual and interim results, and there was frequent contact with the financial community, with a total of over **170 analysts and investors**.

Approximately 140 studies/reports on Acea shares were published during the year under review. Six **investment banks** analyse Acea shares with a high level of continuity, of which five gave the Acea share a positive rating while one gave a neutral rating on 31 December 2021.

ACEA'S ENGAGEMENT POLICY

In November 2021, **Acea adopted the "Policy for managing dialogue with institutional investors, shareholders and bondholders"** (the Engagement Policy), in line with the provisions of the new Corporate Governance Code.

Through this tool, Acea aims to promote a **constant and effective dialogue with these stakeholders** in order to contribute to the achievement of business objectives and strengthen the generation and sharing of value, while ensuring the principles of transparency, timeliness, equal treatment, fairness and reliability.

Specifically Acea's **Engagement Policy defines**:

- the **topics** to be discussed with Institutional investors/shareholders/bondholders;
- the **corporate functions and departments** responsible for engagement, and the methods and deadlines for reporting to the Board of Directors;
- the **channels of communication** through which the financial community can engage with the Company (shareholders' meeting, meetings with analysts, industry conferences, Investor days, webcasts, company website, press releases, etc.).

ESG ANALYSTS RATE ACEA

The Covid-19 pandemic **strengthened institutional investor interest in ESG issues**, which are increasingly integrated into investment decisions. In particular, the financial community's sensitivity to social and environmental issues has increased, with a growth in investor awareness of the attractive risk/return profile that can be offered by sustainable investments.

The increasing attention **ESG investors** place on Acea is confirmed by their growing participation in the company's equity. Based on an analysis carried out in November 2021, these shareholders **represent 5.5% of Acea's share capital and about 40% of the total number of institutional investors**. They consist mostly of European funds, followed by investors from North America.

During the year, Acea further improved or confirmed its position in analysts' assessments, ratings and benchmarks, as illustrated below.



Acea has been confirmed in the "Leadership" category with the **level A-** by **CDP (formerly the Carbon Disclosure Project)**, the international reference organisation, supported by about 600 international investors, which promotes global attention to the management of climate change risks and impacts, inviting companies to provide detailed and timely information on the subject. On the basis of the analysis of the data and information acquired, CDP publishes each year, in a ranking, the assessment made on each undertaking. In 2021, more than 13,000 companies and over 1,100 public bodies disclosed their information through CDP. For details see Box in the chapter Strategy and Sustainability).



In the year under review, Acea **further improved its sustainability solicited rating** by the independent agency **Standard Ethics (SE)**, receiving a rating of **EE** (investment grade F/EEE scale) and confirming the long-term long term expected rating (EE+). In June 2021 Standard Ethics announced the launch of the **SE Mid Italian Index** which will consist of a basket of 20 mid-cap stocks listed on the Italian Stock Exchange selected from a list of 30 companies, including Acea, whose composition will be based on capitalisation and free float values, in consideration of the industrial sector and the rating assigned.

Acea has been included among the 15 largest EU-listed multi-utility companies that have made up the **SE European Multi-Utilities Index** since 2020. This index aims to provide an overview of the level of sustainability progressively achieved by European companies operating in the field of essential public services.



Acea improved for the fourth consecutive year in the assessment of the French ESG agency **GAIA rating (EthiFinance Group)**, achieving a score of **82/100** (78/100 the previous year). The Agency assesses companies on the basis of **75 indicators** in 4 areas: environment, social, governance and stakeholder relations. The assessment process is based both on public evidence provided by the companies and on direct comparison with them; at both stages the agency carries out checks on the reliability and robustness of the data.

During the year Acea also received ESG ratings from other major players: **Sustainalytics** assessed Acea as a company with a low lev-

el of risk, with optimal management control; **Refinitiv** placed the Company in the third quartile, indicating a good ESG performance and an above-average degree of transparency in disclosing relevant ESG data; **MSCI ESG Rating** confirmed the "A" rating (AAA (leader)-CCC scale) upon its assessment of Acea's proactive management of ESG risks. During the year there were also interactions with **VigeoEiris** for the agency's ESG assessment initiatives, and with **ISS ESG** which confirmed the rating already issued. Finally, Acea's presence in the **Bloomberg Gender Equality Index** has been confirmed for the third consecutive year, with a further improvement in the score received, which is 80.67 for 2021. This index includes 418 companies from 45 countries, which best value **gender equality** in terms of disclosure and corporate practices (for more details see the section on Diversity, inclusion and welfare in the chapter Staff).

THE INSTITUTIONS AND THE COMPANY



Acea receives the **SMAU 2021** Innovation Award



the **Acea Innovation Garage 2021**: more than **40** initiatives on **innovation and sustainability**



second edition of the **Acea Innovation Day Building a sustainable future**



Acea collaborates with the **House of Emerging Technologies** in Rome: **smart city of the future**



Acea partners with **Circular 4 Recovery**: The innovation for **eco-friendly development models**

Acea interacts with institutional actors and stakeholders of reference according to a participatory logic in order to generate shared value for the benefit of all stakeholders, primarily the community and the regions it operates in.

THE RELATIONSHIP WITH THE INSTITUTIONS

Relations with the institutions are focused on the economic dimension (taxes and fees) and the social dimension (relations with local institutions, sector authorities, consumer associations and other civil representatives etc.), in line with current legislation and the Group's Code of Ethics.

In 2021 **€150.7 million** (approx. €134.6 million in 2020) was paid

in taxes. The tax rate for the year is equal to 30% (it was 29.2% last year).

The Tax Management Unit in the Parent Company's Administration, Finance and Control Function, has the main function of developing **tax policy** at the Group level, monitoring legislative changes and ensuring periodic compliance, managing – as key owners – the relative risks, which are assessed, managed and monitored within the wider ERM programme. The Unit also prepares, where appropriate, specific information on the subject for the Control and Risk Committee. Acea interacts with the relevant tax system authorities in a collaborative and transparent manner and the updating of the main legal tax disputes is reported annually in the Consolidated Financial Statements, to which reference should be made. In compliance with the relevant legislation, Acea produces a Country by Country Report¹¹¹, which lists the information on taxes paid in each jurisdiction in which the Company operates. **According to the latest Country**

¹¹¹ The obligation arises for the Parent Company due to its control of Acea International, the vehicle company through which shares in the overseas companies are held. The data produced in the Country by Country Report are merged into the audited Consolidated Financial Statements.

by County Report filed by Acea in 2021 with the Italian Revenue Agency **covering 2020 data, 97% of the total amount** is paid in Italy¹¹² while the remaining 3% is paid in the Dominican Republic, Honduras and Peru, where the Company operates in the water sector to improve the service, with reference to certain technical and management aspects (see the chapter *Water Company data sheets and overseas activities*). Overseas activities refer to locally managed businesses **and are not connected to delocalisations carried out to draw fiscal benefits from favourable jurisdictions**. In fact, Acea has not defined a tax strategy and does not intend to establish any aggressive tax planning to gain a competitively advantageous position. Acea regularly pays contributions and registration fees owed to public and private bodies, such as chambers of commerce, independent administrative authorities, industry associations and representative bodies. In 2021, the total amount of this item was approximately € 2.91 million (€ 2.63 million in 2020).

Partnerships with **public institutions** are aimed at carrying out **initiatives with positive effects in the local region and the public's quality of life** (see the chapters *Customers and the community*, *Personnel and Relations with the environment*).

Article 17 of the Group's **Code of Ethics**, devoted to relations with institutions, the public administration and political and trade union organisations, establishes that: *"Acea cooperates actively and fully with the independent Authorities, establishes relations with the Public Administration by strictly observing the provisions of the law, applicable regulations, provisions contained in the Organisation and Management Model pursuant to Legislative Decree 231/01 and in internal procedures [...]".* Acea does not contribute in any way to the financing of political

parties, trade unions movements, committees or organisations [...] or their representatives and candidates [...] Acea does not make contributions to organisations with which a conflict of interest may arise [...] In any case, Acea's personnel shall refrain from any behaviour aimed at exerting pressure (direct or indirect) on political and trade union representatives or representatives of associations in potential conflict of interest in order to obtain personal or corporate advantages".

The supervision of relations with institutional entities is defined by **an organisational model** that attributes competences **and responsibilities** to the corporate structures of reference. In particular, the **Institutional Relations Function** protects corporate interests and represents the Group's positions in dialogue with Industry associations, Research centres, Standard-setting bodies and local, national and international public and private institutions and bodies. The **Legal Affairs Function** supports the Group Companies for **legal aspects** related to the activities, the **Corporate Affairs Function** handles communications with the Supervisory Authorities (Borsa [Italian stock exchange] and Consob [National Commission for Companies and the Stock Exchange]) and the **Regulatory Function**, in coordination with the relevant divisions established within the Group Companies, handles relations with the **regulatory bodies** in the relevant sectors, also to minimize exposure to regulatory risk. The **Group's operating companies**, jointly with the Parent Company, manage the **"technical and specialist"** aspects of the managed services – water and electricity supply, public lighting and the environmental sector – **including through interaction** with administrative, regulatory and control bodies.

INTERVENTIONS BY SECTOR AUTHORITIES WITH RESPECT TO ACEA: REVIEWS, BONUSES AND PENALTIES

In the regulated sectors, the **Regulatory Authority for Energy, Networks and Environment (ARERA)** has established bonus and penalty mechanisms to encourage the improvement of the performance of service operators.

In view of ARERA's approval of the regulatory experiment on service continuity for LV users, **ARETI** paid no penalty in 2021 since the project provides for a final balance at the end of the four-year trial period (this is in 2024 for the four-year period 2020-2023). Areti paid about € 20,000 to the Cassa per i Servizi Energetici e Ambientali (CSEA) for exceeding the standards set for MV users and about € 830,000 to MV and LV end customers for prolonged and extended outages; in 2021, it also earned about € 5.3 million as a premium for interventions aimed at **increasing the resilience of the distribution service** in relation to 2020.

In 2021 the **Lombardy Regional Administrative Court** rejected Areti's application for a declaration that ARERA Resolution No. 270/2020, revising the tariff contribution to be paid to distributors fulfilling their energy saving obligations under the Energy Efficiency Certificates mechanism, was null and void, in execution of Lombardy Regional Administrative Court ruling No. 2538/2019, and ordered the continuation of the proceedings to verify whether it could be annulled due to flaws in its legitimacy. An appeal was lodged against

this judgement, which the Council of State held to be unfounded. Areti also filed an appeal with the Lombardy Regional Administrative Court to challenge ARERA Resolution 550/2020 on white certificates and the determination of the tariff contribution to be paid to distributors under the Energy Efficiency Certificates mechanism for 2019 and, in October 2021, it filed an appeal on additional grounds in relation to ARERA Resolution 358/2021 on the tariff contribution to be paid to distributors for 2020.

The automatic compensations payable to customers by the water companies **Acea Ato 2, Acea Ato 5, AdF, AdF, GORI and Gesesa** during the year totalled approximately € 300,000, € 15,600, € 21,000, € 378,000 and € 25,000, respectively, in relation to contractual quality performance.

In 2021, the **AGCM** [Antitrust Authority] contacted **Acea Ato 2 and GORI** concerning the issue of **two-year statute of limitations on invoiced consumption**, pursuant to the 2020 Budget Law, formulating requests for information which were followed by moral suasion tactics. The Authority has taken note of the feedback received and the actions implemented by the Companies and has deemed these measures suitable to remove any suspicion of unfairness towards consumers, requesting them to provide proof of the actual implementation of the measures by 31/01/2022. The AGCM

¹¹² The low amount of revenue, and consequently the taxes paid, in relation to the Group's activities in foreign countries has led to the overseas companies being reported as non-material from an economic/financial point of view; in addition, the potential evolution of the sector and other strategic and representative criteria regarding the Group's development and main impacts, have resulted in them not being included within the scope of the Consolidated Non-Financial Statement. The main data and information referring to these companies are however included in the Sustainability Report (see the chapter *Water Company data sheets and overseas activities*). Although the issue introduced by GRI 207, on Taxes, was not included among the material issues with the involvement of stakeholders and managers, and therefore does not appear in the *GRI Content Index*, it is in any case mentioned here as testament to transparency and good accounting practice.

has also initiated proceedings against **GORI** concerning its **criteria for charging for the sewerage and purification service**, and has requested it to cease any incorrect commercial conduct, pursuant to Article 4, paragraph 5 of the Regulation on investigative procedures for consumer protection, and at the outcome of the clarifications provided and the actions taken, the AGCM ordered the closure of the proceedings in November 2021.

With reference to the **environmental sector**, AGCM issued two requests for information to **Acea Ambiente and Demap** regarding the treatment of plastics and one request to **Acea Ambiente** regarding organic waste; it also requested additional information from the former following its acquisition of Deco and Ecologica Sangro.

In 2021, a preventive seizure order by the **judicial authorities** involved some limited structures of the sludge line of a purification

plant managed by GORI, which was subsequently released from seizure during the same year.

In November 2021, the Benevento judicial authority ordered the preventive seizure from **Gesesa** of movable and immovable assets worth € 78 million for charges relating to environmental offences under Legislative Decree no. 231/2001; this measure was challenged by Gesesa and the appeal was upheld by the review court which therefore cancelled the seizure in December.

Following a fire that occurred in December 2021, an order was issued to seize the burnt waste and the related warehouse owned by **Demap**.

Finally, as for the litigation procedures of an environmental nature with public enforcement authorities (Arpa, Forestry, etc.), see *Relations with the environment* and the *Environmental Accounts*.

EMERGENCY MANAGEMENT PLANS

In synergy with public institutions, private entities and research bodies, Acea carries out **environmental and social initiatives and projects of an environmental and social nature aimed at protecting common assets**; these projects are referred to and illustrated herein (see, for example, *Relations with the environment* or the chapter *Customers*, paragraph *Quality delivered*).

Acea is active in the **prevention and management of critical events**, and in the **event of an emergency** it provides support to the **authorities responsible for public health, civil protection and public safety**.

In particular, the Group companies ensure the **highest levels of safety and continuity in the provision of managed services**, in collaboration with public institutions.

To this end, they have established **procedures and tools** that, in critical events (unavailability of central systems, breakdowns, adverse weather conditions, peak demand and network stress, etc.), are **able to restore operating conditions of networks, plants and systems in a timely manner** (see also the chapter on Protection of assets and management of internal risks in the section on The company as a stakeholder).

Each operating company has **plans for managing emergencies and intervention procedures** and, through the **control centres, constantly monitors the status of networks and equipment** – water and sewage, electricity and public lighting – in partnership with the **Municipal and National Civil Protection and Roma Capitale**.

Whenever an event affects the managed services (damage to plants and/or networks, water/energy crisis, etc.), the companies of the Group notify the competent bodies to facilitate the coordination of interventions.

Acea SpA has a **procedure for managing health and environmental emergencies** with an impact on the population, **for which it defines the level of risk** (low, medium and high) and provides for the organisation of intervention teams. The company also holds **biosafety Trust certification for actions to prevent and control coronavirus and other viral infections**.

Areti's emergency management plan, the company that handles the distribution of electricity, deals with widespread breakdowns and unavailability of the grid. It defines the different **states of activation** (ordinary, alert, alarm and emergency), according to the operational and environmental conditions, the procedures for the activation (and subsequent reset) of the same states, the **units involved** and the respective roles, and the **resource materials** necessary for maintaining or restoring equipment. It also provides for the appointment

of a **Head of Emergency Management** and an employee dedicated to the **management of safety**, in specific cases. The **detailed Operating Plans** indicate methods for quickly managing the types of disruption (such as flooding, fires, disruptions to the remote-control network, etc.) and procedures to be followed, for example, **for restarting the electrical system in the event of a blackout** of the National Transmission Grid (NTG) or **re-establishing power for strategic users** (such as parliament, the government, the State of Vatican City, etc.), **the materials, equipment and resources to be involved** depending on the case. The master plan and detailed operating plans are **updated on a yearly basis** and periodically improved on the basis of analyses of real cases. The effectiveness of procedures and the functionality of equipment are tested by means of drills. In addition, with a view to improving processes, the Company created a platform for the real-time **acquisition and monitoring of weather events**, in order to prevent potential risks from changes to the operating conditions of the electric grid.

Plans for the management of emergencies of the **water companies** define conditions that compromise the **continuity and quality of the integrated water service, classify the emergency levels**, describe the **preventive and remedial measures** for the types of unforeseen events (damage to the networks, pollution, water crisis and emergencies related to the sewerage and treatment service) and provide for the division of tasks among the areas involved (technical area and communications). These are shared with local institutions (such as Governmental Territorial Offices, Local Health Authorities, Area Management Agencies). In particular, the **Acea Ato 2 Plan was reviewed**, consistent with the Water Safety Plan guidelines, and takes **25 critical scenarios** into consideration, specifying the consequences, manoeuvres and mitigation actions required for each of them. In 2021, the Company updated its Emergency Management Plan, also based on the procedures applicable under the pandemic conditions and in the light of organisational changes, and set up the **Standing Emergency Committee** which meets on a periodic basis to propose interventions and training activities, and to decide on actions in serious emergency conditions.

Acea Ato 5 continued its collaboration with ARPA Lazio for the "Environmental surveillance project of Sars-CoV-2 through urban wastewater in Italy".

AdF collaborated with the **Tuscan Water Authority** on the updating of the **Emergency Operating Plan for the drinking water crisis (EOP)**, aimed at monitoring and preventing water emergencies through the periodic reporting of critical issues found within the region, and providing support for operational decisions when an emergency arises. In the context of the critical issues outlines in the

Plan, AdF has in place a **Water Crisis Emergency Management Operating Procedure** which, establishes the sequence of activities to be carried out, detailing all of the entities involved, measures to be taken, documents/databases to be consulted/updated/produced, and correspondence to be sent, for every expected level of severity. Together with other authorities such as the Province of Benevento, the Municipality of Benevento, EIC, the Region of Campania, ARPAC [Campania Regional Environmental Protection Agency] and local health authorities, etc., Gesesa is an active member of the **technical panel to ensure that the local aquifer** is safe from tetrachloroethylene pollution.

The **companies of the Group that manage waste treatment plants** ensure the execution of a detailed **routine maintenance plan** to **reduce plant downtime caused by faults or unexpected events** and minimize unplanned non-routine maintenance work. All the structures of each site are equipped with **Emergency Plans** that take into account the **scenarios identified for endogenous and exogenous emergencies**. These Plans examine aspects related to the **safety of workers**, ensuring their safety with specific behavioural and evacuation procedures, checked on a yearly basis, and aspects related to the **protection of the environment**, identifying the emergency interventions in order to limit contamination of environmental media (air, water and soil). Permits by virtue of which the plants are managed also include communication requirements and methods for **non-routine or emergency events to the competent bodies**, in order to guarantee the maximum dissemination of information and, where appropriate, the coordination of the intervention.

Acea Elabiori has **updated the Emergency Plans of the Grottarossa and EUR2 Centres with the inclusion of measures to counter the spread of Covid-19**.

Finally, as already mentioned, in 2021 both Acea Elabiori and Acea Energia received **Biosafety Trust Certification** by implementing an infection prevention and control management system and adapting their Emergency Plans.

PROJECTS FOR THE INNOVATIVE AND SUSTAINABLE DEVELOPMENT OF THE AREA

In the **water segment**, Acea has adopted the **Smart Water Company model** which is characterised by responsible and sustainable management of water resources, thanks to the increasing **digitalisation of the network**.

In 2021, some water companies, in agreement with local administrators, started or continued a review a programme of **installation of Water Kiosks** in the areas managed (see the chapter Customers, paragraph The quality delivered in the water segment).

In the smart city field, in line with its strategy for electric mobility and its plan to install electric columns, in 2021, Acea **launched the e-mobility App** which allows customers to recharge their electric vehicle at more than 10,000 enabled points in Italy, thanks to interoperability agreements signed with industry players (see the chapter Customers chapter, paragraph Customer care).

Acea also works with **ENEA on projects aimed at sustainable management of the waste and water cycle**, with the objective of applying innovative technologies and solutions to industrial projects (see Relations with the environment, Water segment).

Finally, as part of the implementation of the Lazio Region European Social Fund Operational Programme, **Acea Elabiori** in collaboration with ENEA and the University of Cassino and Southern Lazio has launched an **Industrial Research Doctorate** to implement a sustain-

able management strategy for sludge from wastewater treatment, to limit its environmental impact, to limit its environmental impact.

In order to promote the innovative and sustainable development of the sectors of reference, Acea establishes **collaborations and partnerships with complementary companies** or organisations operating **in sectors similar to the businesses it manages** and **with innovative players**.

In 2021, Acea was a partner of the “**Circular 4 Recovery**” call for projects, promoted by Marzotto Venture Accelerator to **select innovative projects aimed at creating eco-friendly development models and fostering the transition to a more sustainable economy**.

In particular, the call selects, awards and supports entrepreneurial projects aimed at the development of innovative technologies, solutions and services with a low environmental and social impact in the following 5 Key Focus Areas of the Circular Economy: *Circular Bioeconomy, Circular Water Economy, Circular Energy Economy, New Circular Life Cycles, Circular City & Land*.

7 proposals were examined further and feedback was provided.

In 2021 Acea **signed specific agreements (MOUs) with foreign companies for the development of innovative technologies for the production of green hydrogen** (SGH2, Innovathec and Omni). Collaborations also continued with **private companies active in the green and circular economy, advanced plant engineering, innovative treatment for recycling and recovery of waste and reduction of emissions**. These include Nextesense, for the use of visible light lamps with sanitising action (BIOVITAE) in the purification of water and waste, Opus, for the creation of an analytical robot for the analysis of TSS in waste water, Raft, for the production of new technologies for the abatement of emissions, in particular odorous emissions, by means of photocatalysis and catalytic oxidation, and the Sersys Group, for the joint development of projects and collaborations in the field of waste treatment and specialist analytical activities. Moreover, **collaboration agreements were signed** with new companies, including Absolute Energy, for the exploitation of an advanced waste shredding mill, Wasserchemie, for the development of a predictive model for optimising the use of filter masses, Uviblox, for the development of UV technology for abatement of odour emissions, Lod, for the development of an advanced online odour emission monitoring system using odour chemical fingerprinting, and Nature 4.0, for the development of a new category of low-cost sensors for environmental monitoring and the creation of an electrochemical sensor calibration laboratory.

Acea is one of the companies that won the tender, together with TIM and Windtre, to collaborate for the next three years on the **Casa delle Tecnologie Emergenti** [House of Emerging Technologies] (CTE) in Rome: this will be the first permanent living lab, deployed in 2021, to develop the smart city of the future. The project is sponsored by the Department of Economic Development, Tourism and Employment, in cooperation with universities, research centres, companies and partners specialised in technological progress.

In November 2021, in partnership with US software provider **Citrix, Website and Codemotion**, an Italian platform that supports the professional growth of developers, Acea launched “**Innovate the way we work**”, a **hackathon** to search for solutions to be implemented on Digithall, the digital workplace.

Finally, with the aim of bringing together the protagonists of innovation to study new models of urban development, Acea organised the **second edition of Innovation Day**, entitled **Builders of the Future** (see box).

ACEA INNOVATION DAY 2021: NEW TECHNOLOGIES FOR BUILDING A SUSTAINABLE FUTURE

On 5 July, the second Acea Innovation Day was held at the Salone delle Fontane in EUR, Rome.

The title **Builders of the Future** represented the Group's readiness to discuss the challenges ahead with experts with sector experts and institutional representatives. In this second edition (the first was held in 2019), the focus was on the themes of innovation and how they can represent the drive for the country's solid and lasting recovery. Digitalisation, cybersecurity, green energy, electric mobility, circular economy, network resilience to manage the growth in electricity demand and tackle climate change: these were the topics at the heart of the event, which took place in "phygital" (part pres-

ence, part digital) mode to outline the scenarios and new industrial models. Important companies participated in the day's work, including Cisco Italia, IBM Italia, Leonardo, Google Cloud Italia, Accenture Italia, the ELIS Consortium, CDP Venture Capital SGR and Mind The Bridge.

The challenge is to create a **community of innovators** acting together to accelerate the process of technological evolution of infrastructures, to develop the competitiveness of companies and offering more efficient services. The live broadcast was followed by about 5,000 online users, with an average of about 200,000 views online and offline.

The virtuous relationship with the local region is also expressed through the **collaboration between Group companies and the educational world of the new generation** (see Customers, section on Communication, events and solidarity, and Personnel, section on Development of human resources and communication).

In 2021 **Acea Ambiente** signed an agreement with the University of Cassino to carry out the research project **CO₂ capture and environmental impact mitigation in waste-to-energy plants** and has carried out projects to educate people about sustainability and the circular economy, such as the **Differenzio Anch'io** [waste sorting] project.

In 2021, **AdF** involved a number of schools in the province of Grosseto in environmental education projects **#bevisenzaplastica** [drink without plastics] on the conscious use of water resources, distributing 3,000 water bottles to school students and installing 14 water dispensers.

Gesesa has launched the **"Plastic Free" project aimed at local institutes and universities** and donated water bottles and dispensers to the institutes to reduce the use of plastic in the area served and also donated the first water kiosk to the University of Sannio.

Collaborations with universities and research institutes are carried out within the framework of **conventions and agreements**.

To assess changes in the availability of water resources in the short and long term, in 2021 **Acea Ato 2** initiated collaboration agreements with the **CNR Institute for Water Research** for the development of tools and instruments for forecasting the flow rates available for drinking water purposes in relation to short-term scenarios (less than 1 year), and with the **University of Catania** for the prediction of the probability of satisfying the available water flows in the event of climate change in medium and long term scenarios (30, 50 years).

AdF has begun working with the **Environmental Engineering Department of the University of Florence** to study the concentration of microplastics in urban wastewater and sewage sludge.

Within the framework of the study, research and technical/scientific support agreement with the **Department of Earth, Environmental and Resource Sciences of the Federico II University of Naples, GORI** carried out a study on the sludge produced by the Area Nolana purification plant, with the aim of assessing the potential for biogas production, and was involved in a study on emerging

contaminants, recently conducted in collaboration with the University of Salerno and a group of researchers from the Water Research Institute of Bari.

Acea Elabori has signed several collaboration agreements with different Universities: the **Department of Pharmacy of the Federico II University of Naples** for the development and use of sensors and biosensors in the environmental field for the online determination of chemical species, particularly metals, drug residues, endocrine disruptors, PFAS and other chemicals of emerging concern (CECs) in wastewater and post-treatment water; the **Department of Civil and Environmental Engineering, University of Florence** for the development and validation of innovative technological solutions for the advanced monitoring of solid, liquid and gaseous effluents from wastewater and waste treatment plants, including odorigenic emissions and greenhouse gases; the **National Interuniversity Consortium for Materials Science and Technology** for the design of innovative materials and the development of new technologies for the production and recycling of materials with a view to a circular and sustainable economy; the **CERI Research Centre "Prediction, Prevention and Control of Geological Risks" of the University of Rome La Sapienza** for the development of models for hazard analysis on a large scale in relation to geological instability processes, to assess the risk exposure of structures and infrastructures the **Department of Astronautical, Electrical and Energy Engineering of the University of Rome La Sapienza, Faculty of Civil and Industrial Engineering** for the development of 4.0 sensors to optimise the operation and safety of integrated water sites; and finally with the **Marche Politecnico University** for the development and field validation of methods for calculating and critically analysing the carbon footprint of integrated water services and waste treatment.

In the **energy field**, **Areti** actively participated in the meetings of the **Milan Politecnico's Drone Observatory** during which it presented the **G.I.M.M.I. project**, project, whose high level compared to similar projects on the national scene was appreciated.

COMPARISON WITH THE REFERENCE CONTEXT

Acea participates in **Research Centres, Standard-setting Bodies and Industry Associations**, acting as sponsor or contributing to studies in the businesses in which it operates.

THE 2021 MEMBERSHIPS OF RESEARCH CENTRES, STANDARD-SETTING BODIES AND INDUSTRY ASSOCIATIONS

During the course of the year the Group renewed and activated numerous memberships of organisations of interest, including:

- AGICI – Finanza d'Impresa
- AICAS Associazione Italiana Consiglieri, Amministratori e Sindaci
- AIDI Associazione Italiana Illuminazione
- Analysis
- Andaf
- ANFOV
- ASCAI
- Aspen Institute Italia
- Assochange
- Associazione Amici della LUISS Guido Carli
- Associazione Civita
- Associazione Geotecnica Italiana
- Associazione Italiana Internal Auditors
- Associazione Italiana Esperti Infrastrutture Critiche (Italian Critical Infrastructure Experts Association – AIIC)
- Associazione Elettrotecnica ed Elettronica Italiana (Italian Electro-technical and Electronic Association – AEI)
- Associazione Idrotecnica Italiana (Italian Hydro-technical Association – AIH)
- Associazione nazionale fornitori di elettronica (National Electronics Suppliers Association – Assodel)
- Assonime
- ASTRID
- CEDEC Bruxelles (European Federation of Local Energy Companies)
- CEEP Bruxelles (European Centre of Employers and Enterprises providing Public services)
- Centro Studi Americani (Centre for American Studies)
- CDP Worldwide
- CISPTEL Confservizi Toscana
- Club Ambrosetti
- Comitato Elettrotecnico Italiano (Italian Electro-Technical Committee – CEI)
- Confindustria Umbria
- Conseil de cooperation economique
- CONSEL Consorzio Elis per le Formazioni
- Sustainability Makers - the professional network (formerly CSR Manager Network)
- Distretto Tecnologico Nazionale sull'Energia (Di.T.N.E.)
- EDSO Bruxelles (European Distribution System Operators' Association for

- Smart Grids)
- Elettricità Futura ("Future Electricity" formerly Assoelettrica-AssoRinnovabili)
- Energy and Strategy Group – Politecnico di Milano (ES-MIP)
- EU Bridge Harmonized Electricity Market Role Model
- EU-DSO (European Distribution System Operators' Association)
- EURELECTRIC Bruxelles (Union of the Electricity Industry)
- FAI Fondo per l'Ambiente Italiano (Fund for the Italian Environment)
- FERPI
- FIRE (Federazione Italiana per l'uso Razionale dell'Energia) (Italian Federation for the Rational Use of Energy)
- FISE Assoambiente
- Fondazione Global Compact Network Italia (Global Compact Network Italy Foundation)
- Fondazione Roma Europa
- Fondazione Utilitatis (Study and Research Centre for Water, Energy and the Environment)
- Gruppo Galgano
- IATT (Italian Association for Trenchless Technology)
- ICESP Piattaforma Italiana Economia Circolare coordinata da ENEA
- I-Com (Istituto per la Competitività – Institute for Competitiveness)
- IGI (Istituto Grandi Infrastrutture)
- InnovUp
- ISES Italia (International Solar Energy Society – Italian Section)
- Laboratorio dei Servizi Pubblici Locali di REF-Ricerche (Local Public Services Laboratory of REF-Ricerche)
- Norman Network
- Italian Phosphorus Platform coordinated by AENEA and MATTM
- Servizi Professionali Integrati
- Task Force Demand Side Flexibility
- Task Force TSO-DSO on Distributed Flexibility
- Task Force TSO-DSO on Smart Grid Indicators
- UNI (Italian Standards Body)
- Unindustria Lazio
- UPA Utenti Pubblicità Associati
- Utilitalia (Federazione delle imprese ambientali, energetiche ed idriche) (Federation of Environmental, Energy and Water Companies)
- UNICHIM
- World Energy Council (WEC)

Acea **participates in occasions for dialogue with the business world and the scientific community on issues of national and international importance and offers its own specialist contribution on the occasion of thematic conferences**, forums and workshops on topics linked to its managed companies, also presenting publications and works of technical-scientific relevance.

To this end, in 2021 the Group participated in events and organised numerous initiatives (see Customers and the community, paragraph on Communication, events and solidarity; Strategy and sustainability in corporate Identity and the section on Relations with the environment), including the third edition of the **Acea Sustainability Day**

during which institutions and companies discussed the challenges and opportunities for a fair and sustainable ecological transition, **Ecomondo** the most important green and circular economy fair in the Euro-Mediterranean area, the **Forum PA**, the largest national event on innovation, to create and strengthen connections between all the players operating in central and local administrations, technology companies, and territories around the missions, objectives, and actions of the National Recovery and Resilience Plan (PNRR), **SMAU Milan 2021** and the European event on innovation **Maker Faire Rome** (see box).

ACEA AT MAKER FAIRE 2021

In October 2021 Acea participated, for the eighth consecutive year, at **Maker Faire Rome-The European Edition**, Europe's largest innovation event. This edition was held both digitally and in person. From 8 to 10 October, **Acea was present at the Gazometro Ostiense with a dedicated stand** where it presented the most **innovative solutions for industry 4.0 solutions applied to its infrastructures and industrial areas** to the community of makers and startups from all over Italy and to the public:

- G.I.M.M.I.: a project involving inspections and surveys with drones and satellites for an even safer and more sustainable electricity grid.

- Waidy Wow: the new version of the app that makes "smart" fountains, public fountains and water kiosks and involves an increasingly wide community of users.
- Workers Watch: a collaborative effort between the Acea Group and Beam Digital, to improve safety prevention and management efforts for Acea employees.
- Augmented Reality: the meeting of the real and virtual worlds, to simulate scenarios, share experiences and data, train people and rethink industrial processes.

On **sustainability** issues, Acea participates in **networks of experts, working groups, studies and sector research** organised by the academic world, civil society, institutions or business entities. Indeed, the company is active as an associate in the **Global Compact Network Italy Foundation**, the representative body of the United Nations Global Compact in Italy, the **Sustainability Makers - the Professional Network** (formerly the **CSR Manager Network**), the national association that brings together the main Italian companies active in corporate social responsibility.

Acea's participation in **Utilitalia**, the federation that brings together the multi-utilities of water, environment, energy and gas, is also expressed through its participation in **technical panels and topical working groups**. In particular, in **2021**, Acea participated in the following **working groups within the context of Utilitalia's Transition plan: Finance, Accountability, Corporate Mission and Sustainable Success**. The company also participates in benchmark analyses on sustainability in Italian Utilities, like those carried out by the **Utilitatis** research centre and **Top Utility**.

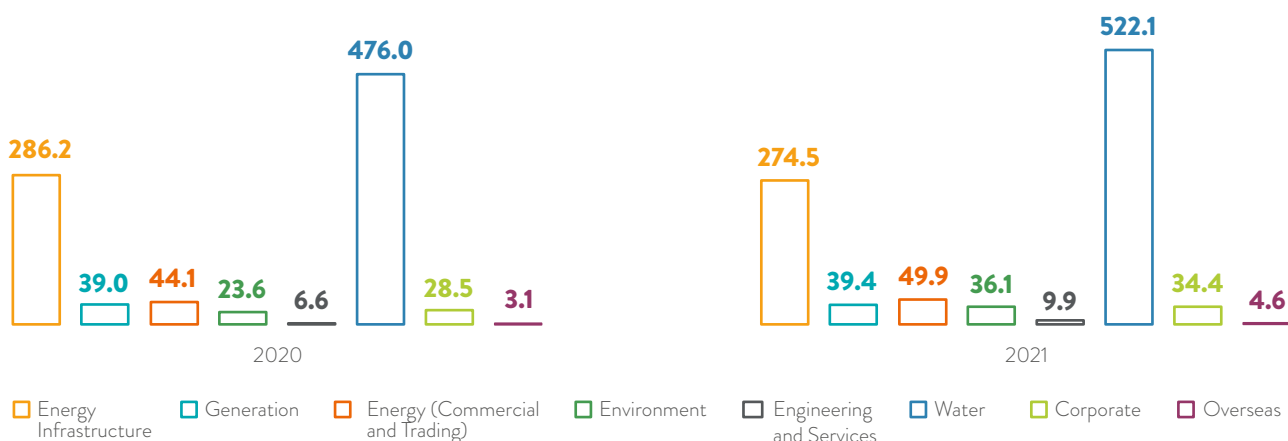
THE COMPANY AS A STAKEHOLDER

THE MANAGEMENT OF COMPANY ASSETS

Acea protects and enhances its tangible and intangible assets, seeking a sustainable financial position and **governing the internal needs**, linked to the operating management and the **growth prospects**, consistently with the aims expressed in the business mission and the strategic plan.

In 2021 **investments** totalled **€ 970 million**, up 7% (€ 907 million in 2020). These were distributed by business segment as follows: € 36.1 million for the **Environment** area, in particular for work on Acea Ambiente's plants and for the change in the scope of consolidation attributable to Ferrocarril; € 49.4 million for the **Energy (commercial and trading area)**, both for Acea Innovation projects and for activities related to the acquisition of new customers and Acea Energia's IT implementation initiatives; € 522.1 million for the water area, with increases due to the capital expenditure plan distributed among Acea Ato 2, GORI and AdF and to the change in the scope of consolidation; € 9.9 million for the **Engineering and services** area, for the design and implementation of new processes and extraordinary maintenance of the head office and laboratories; € 274.5 million for the **Energy Infrastructure** area, for work on MV/LV networks, substations, measurement and remote control instruments and projects to re-engineer information systems; € 39.4 million for the **Generation** area, both for work on Acea Produzione's district heating plants and network and for investments to develop photovoltaic systems. Finally, the **Parent Company** and **Overseas** with investments for about € 34.4 million and € 4.6 million, respectively.

Chart no. 48 – Breakdown and investments by segment (2020-2021)



Depreciation, amortisation, provisions and write-downs amounted to **€ 675 million** (8.8% higher than 2020). The increase in depreciation and amortisation is related to changes in the scope of consolidation and investments in the period in all business areas. The increased impairment of receivables is mainly attributable to Acea Ato 2, Acea Ato 5 and GORI. Provisions for risks decreased slightly, essentially remaining stable.

THE COMMITMENT TO RESEARCH AND INNOVATION

Scientific and technological innovation at the service of business processes is one of the pillars of the **Group's strategic planning**, an area in which it invested more than **€ 6 million in 2021**. At Acea,

innovation is a **transversal** strategic lever that is **open** to the external ecosystem: Through its innovative approach, the company aims to **explore new business** and the creation of **new development models**. **The management of the Group's innovation line** is managed by the **Technology & Solutions Function of Acea SpA**, which has the task of developing and implementing infrastructures, systems, products and services in the technological, innovative and digital field, directing and coordinating the preparatory activities for the generation of products and services in the market segments of interest, and by **Acea Innovation** which facilitates the Group's design and innovation initiatives, generating products and services for the business (B2B) and institutional (B2G) markets, particularly in the area of electric mobility.

The innovation **model** identifies internal needs or areas of interest and adopts typical Open Innovation processes and approaches, with the **collective generation of ideas and the involvement of internal and external stakeholders** starting from the conception process, moving on to the trialling of the design concept, to the implementation of the projects. According to this logic, the **promotion of the Group's culture of innovation and the development of internal entrepreneurship are fundamental** and to that end a dedicated crowdsourcing platform was created, which collects employees' design ideas and creates a company space for active involvement. Also present is the **Innovation Board**, made up of innovation representatives from the various industrial entities, which, in a shared manner, defines and creates the Group's innovation strategy.

To render the approach to innovation systematic:

- the **"Acea Innovation Garage" corporate entrepreneurship programme was developed**, to be launched for the second time in 2021, with the aim of facilitating new project ideas to be implemented within the company, stimulating the entrepreneurial skills of employees;
- **idea generation workshops** are organised to creatively address business and innovation needs;
- **internal communities** are active, as **experimental spaces in which new tools and languages can be collectively studied and analysed, best practice can be shared, and new projects can emerge**, and include the Data Community, an informal space in which professionals from the various businesses meet and exchange knowledge on issues related to the world of data.

More than 40 initiatives on various topics of strategic interest to the company were organised through the **Acea Innovation Garage** in 2021 organised, both in person and remotely, including:

- **30 digital workshops and in-person initiatives** dedicated to sharing new ideas on: Circular Economy, Smart Water, Smart Energy, Smart Organization and Human, Business Process Management and Customer Experience Transformation;
- **8 meetups dedicated to the Innovation Community** aimed at exploring and narrating the world of innovation in Acea;
- **1 Hackathon**, in an Open Innovation perspective, to search for innovative solutions to be implemented on Digithall, Acea's digital workplace.

The Innovation Model involves the use of **market analysis, continuous scouting and development of national and international partnerships**, with **players in the innovation ecosystem active in sectors of strategic interest to the Group**. This allows Acea to activate privileged channels of access to ideas, business and technological opportunities, academic research and provides new talents to innovate business, processes and corporate products.

To this end, in 2021 Acea participated in the following programmes:

- **Startup Europe Partnership**, which promotes a sustainable and global entrepreneurial ecosystem thanks to programmes and activities intended to support combinations between scale-ups

and international corporations, supporting the growth and development of relations through innovation. Acea can thus access highly innovative companies that, compared to a startup, have already gone through all stages of development and have an advanced business model and a product already on the market. Thanks to this valuable collaboration, Acea participates in summits with innovative European companies, the Israeli ecosystem that represents a point of reference for innovation, and is also given the opportunity to meet scale-ups from Silicon Valley, the cradle of innovation par excellence;

- **Elis Open Italy**: the objective is to support dialogue and cooperation between large companies, Italian start-ups/SMEs and innovation enablers such as accelerators, research centres, venture capitalists and young talent, through concrete innovation projects. For some time now Open Italy has created "a venue" where various stakeholders can meet and work together to incentivise the introduction and development of innovative solutions within the Italian economy, supporting an open innovation culture in Italy;
- **Osservatori Digital Innovation [Digital Innovation Observatories] of the Politecnico University of Milan**, a point of reference for digital innovation in Italy, in which Acea participates mainly through the **Startup Intelligence Observatory**, a community of discussion and open innovation at the apex of innovation. In 2021 Acea participated in the **Space Economy Observatory**, to explore the opportunities of space technologies;
- **Zero Accelerator**, the startup accelerator born from the collaboration between the National Network CDP Venture Capital SGR - Fondo Nazionale Innovazione, Eni, L'venture Group and Elis to support the best startups and innovative SMEs that develop projects and solutions in the greentech/cleantech field aimed at minimising carbon impact, facilitating the reduction of emissions, optimising the waste cycle by speeding up energy transition processes and promoting the circular economy;

In addition, in 2021, **collaborations** continued with **Talent Garden** on digital transformation and corporate innovation projects **InnovUp (formerly Italia Startup)**, the non-profit association representing the Italian start-up ecosystem, extended to include all private and public entities, to encourage the emergence of a new Italian entrepreneurial fabric; and **ANFOV**, an association that promotes dialogue between companies and institutions involved in the telecommunications sector and monitors, analyses and encourages the development of the contiguous ICT scenarios.

Finally, **Acea is a partner of the Italian National Young Innovators Association (ANGI)** and, as part of the "National ANGI Award", collaborates in the awarding of the special "Innovation Leader Award" for young talent.

In recognition of its achievements, in 2021 Acea again received prestigious **awards in the field of innovation** (see box).

AWARDS IN THE FIELD OF INNOVATION

Acea's commitment to innovation has been recognised by important institutional initiatives.

Acea won the SMAU 2021 Innovation Award with the **"Lean Procurement for innovative start-ups and SMEs"**, a new subsidised model to engage innovative start-ups and SMEs that calls for a dedicated procurement process that overcomes the obstacles of traditional processes. In December,

GORI won the Innovation Award at **SMAU Naples**, with the project **"Smart Metering. Use of IoT technology in Integrated Water Services management"**.

Finally, at **Ecomondo 2021** Acea won the ecohitech Award with the **PASO project** "for the value of a solution concerning the aspects of maintenance and intelligent monitoring of critical infrastructure for energy efficiency".

With reference to the Group's industrial processes and infrastructure, the following boxes illustrate, by way of example, the main **research and innovation projects** carried out in 2021 by Acea SpA's Technology and Solutions Function, Acea Innovation, Acea Elabari and the industrial segments of the Group. We also recall what has

already been illustrated in the paragraph Relations with institutions, and in particular *Projects for the innovative and sustainable development of the territory*, Customers and the community and the section *Relations with the environment*.

RESEARCH AND INNOVATION AT ACEA SPA

In 2021, the **Innovation unit of Acea SpA's Technology & Solutions Function** with the involvement of all the company's entities and external start-ups, launched and/or **realised numerous experiments and initiatives for the innovation and digitalisation of services**, including:

- the implementation of **SIDE**, the innovative project, developed in collaboration with Areti and the startup BlueTensor, which uses Artificial Intelligence and Computer Vision algorithms applied to images of secondary substations to uniquely identify and catalogue substation components;
- the launch of the **"OCR" experiment**, in collaboration with Acea Energia, to simplify the management of utilities by customers;
- the development, in cooperation with Acea Ato 2, of the **DepurArt** App usable by all citizens visiting some of the major purification plants, which guides them with audio descriptions, photos and videos, along the wastewater treatment cycle; in 2021 the project was developed at the Fregene plant;
- the testing of a system of preventive detection of malfunctions or disturbances on Rome's public lighting network, such as interference caused by vegetation, using satellite images and artificial intelligence, carried out in synergy with Areti;
- the project for the **usage of sensors and development of artificial intelligence algorithms in order to perform predictive maintenance**

and ensure real-time monitoring of values of interest at the Scafati water purification plant, developed with Acea Elabari and GORI and in collaboration with the startup Ammagamma.

- the creation of a **new navigable web bill** for water;
- the **digitalisation of the services offered** to citizens with the consolidation of the **digital counter and the launch of the first Waidy Points** in the territory managed by Acea Ato 2;
- the **launch of the project for the evolution of the IT system for customer management (CRM)**, which provides for the complete redesign of commercial processes on the new Salesforce tool, according to the principles of customer centricity, complete digitalisation, flexibility and effectiveness drivers. The project will continue over the next two years with the progressive re-engineering of all business processes;
- the **consolidation of the Waidy Management System project**, which envisages the creation of an **IT platform to support decisions for the core water business**, in order to protect the water resource and reduce losses, improve the quality of the resource, and promote measures in favour of environmental sustainability;
- the **launch of the SAP Asset Management project**, which envisages the evolution of the app used by technicians within the workforce management model, by improving the user interface and the complete digitalisation of operational activities.

RESEARCH AND INNOVATION IN THE ENERGY AREA (COMMERCIAL AND TRADING)

In 2021, **Acea Innovation** was very active in the electric mobility area. It has further developed the **Charging Point Operator platform, integrating it in interoperability with 3 EMSP (E-Mobility Service Provider)** and created the **Acea Energia EMSP (Electric Mobility Service Provider) platform**, which launched in April.

As part of its activities in the sale of electricity and gas commodities and non-commodity services, **Acea Energia** has launched or implemented the following innovative projects:

- the first releases of the **E2CRM digital transformation programme**, which involved adopting the Salesforce CRM platform, enabling all processes to be implemented digitally, with a consequent reduction in contacts through traditional channels and paper-based flows; developing new functions on the portal reserved for customers in the Large&Business segment; activating a new funnel that makes customers converge towards the Acea.it website, in line with the latest digital developments; creating new reporting models and implementing tracking on all sales and post-sales processes;

- the **launch of the 'digital consultancy' channel on the Genesys platform**, a new way of interacting with customers that does not require the physical exchange of documents;
- implementation of PoC (Proof of Concept) to **verify the application of artificial intelligence (AI) model mechanisms in the claims classification phase**. The results of the PoC showed that large-scale implementation, planned for 2022, could increase the accuracy of complaint classification, with economies insofar as resources are concerned;
- the **start of the implementation project based on the datalake**, with the release of the first reports on the Qlik platform, which allowed an improvement in data monitoring aimed at preventing critical issues for customers and operations;
- the completion of technical implementations for the activation of **application-to-application communications with third parties** where required (IIS, Distributors, etc.). This reduces the processing times of requests and in the number of staff involved in handling cases.

RESEARCH AND INNOVATION IN THE ENERGY INFRASTRUCTURE AREA

In 2021, **Areti** launched, continued or concluded several innovative projects as part of its electricity distribution activities, including:

- the **PlatOne project**, which was financed by the European Community and was coordinated by the company. This project involves 12 partners from Germany, Belgium, Greece and Italy and **experiments with innovative management of distribution networks through the direct involvement of end customers**. Electricity service interruptions are resolved by a coordinated change in consumption and/or production of customers who are connected to the portion of the network affected by the event. The variations of individual customers are small and can be aggregated by a market participant (Aggregator) and organised into offers according to a predefined scheme. The most convenient offers that are technically compatible with the limitations posed by the infrastructure, are activated and monitored by a device, developed by Areti, that receives the Distributor's commands, transfers them to the actuators and interfaces with the new generation meter to read the measurement data in real time. The measurement data are then used to calculate the remuneration to be received by the customer for the service provided;
- the **POLEDRIC** project, for the construction of an **intelligent public lighting pole** in the city of Rome, is able to improve the public lighting service (through sensors and the use of advanced technologies) while **enabling additional environmental, security and communication services** (environmental sensors, traffic and parking monitoring sensors, video surveillance and video analysis services, etc.), from a **smart city** perspective. At the end of 2021, the partnership tender was concluded;
- The **G.I.M.M.I.** project (Massive and Targeted Infrastructure Inspection Management), to **reduce undiscovered faults on overhead lines** and asset monitoring, through periodic analysis of satellite images and targeted drone inspections;
- the **'AUTONOMOUS'** project, to **reduce the incidence of faults in the primary substation**, by means of preventive inspections either autonomously or remotely guided by a UGV

(Unmanned Ground Vehicle) drone. In 2021, the testing of the solution continued with the setting up of a recharging box in which the drone, at the end of the mission, can recover and recharge itself, and the data collection and management platform was created, which is necessary for the integration of the new solution in the current inspection processes;

- the **Automa per Selezione Guasto in TLC [Automated Fault Selection in TLC] project**, aimed at supporting and **automating human operations by means of Robotic Process Automation techniques for remote fault selection on the network**. During the year, a demonstrator project was implemented to perform fault selection on a portion of a real network, using logic developed in matlab which, thanks to innovative Robotic Process Automation techniques, interacted with the SCADA system. The demonstrator project made it possible to verify the validity of the approach and to define the integration solution when fully operational;
- the project **Automation of Low Voltage Lines**, aimed at enabling remote control and automating the reclosure of low voltage lines from the secondary substation on disconnection for excess power;
- the **Bilateral LTE Automation project**, which involves the implementation of a field **automation solution to select the fault line and uses the 4G network to make the switches along the line communicate**. During 2021, development and testing of the solution was completed and mass deployment in the field began. The project also included the development of a central device management platform for the remote management of peripheral Industrial IoT devices that support the other remote and service monitoring solutions for the secondary cabin;
- a **pilot project** for the application of "IoT Internet of Things" technologies to **secondary substations**, with the aim of collecting and analysing measurements of **environmental parameters** and electrical quantities from the low-voltage network, to **improve plant maintenance and energy loss control**. Testing of the prototype on four secondary substations was completed in 2021.



RESEARCH AND INNOVATION IN THE WATER AREA

With the aim of improving operational performance carried out in collaboration with **Acea Elabiori**, **Acea Ato 2** conducted **research activities and technological-digital innovation** on:

- the **satellite radar technique for remote monitoring Intasar Functional monitoring of the stability of elevated structures on the ground** (e.g. tanks) with specially designed reflectors to improve accuracy and resolution;
- **monitoring of emerging organic micropollutants (EOM) and endocrine disruptors in the wastewater of medium- to large-sized plants**, selected according to process scheme and territorial location; monitoring activities continued at the CoBIS and Roma Sud plants and those of the Tiber River relating to environmental risk assessment and analysis;
- the **advanced sensichips sensors**, completing in-depth tests with impedance methodology in different test modes (batch tests in wastewater);
- **ultrasound**, completing the VTA GSD technology trial that began in 2020, to assess achievable performance in sewage sludge disintegration pretreatment;
- the **study on the "SARS Virus CoV 2 carried out with the Istituto Superiore di Sanità**, concerning the circulation of the virus in waste water with participation in the SARI circuit, as ST3 laboratory, validated from sampling up to the quantitative results;
- **characterisation of the floating residue from the desanding/de-oiling process of urban wastewater and assessment of the best treatment technologies**; a number of plants deemed suitable for carrying out the study were selected and the qualitative and quantitative monitoring phase continued;
- full-scale **experimentation of Taron technology** at the Santa Fumia wastewater treatment plant, which uses a dynamic rotating disc filtration system that combines secondary sedimentation and tertiary filtration in a single step, optimising the wastewater treatment process;
- **lysis technologies for optimising biogas/biomethane production**, with the launch of an experimental study to increase biogas production from anaerobic digestion plants at some purification plants.

With regard to innovation applied to the management of **water distribution networks** new generation techniques - satellite, noise recorder and fibre optics - were tested for **hidden leak detection** (Noise Logger and Satellite Radar Interferometry).

For the **waste water purification** the main projects carried out by Acea Ato 2 concerned:

- the installation of the **new ozonolysis station for sludge reduction** at the Ostia plant, in view of the excellent results already obtained with the testing of the system;
- The **optimisation of the anaerobic sludge digestion compartments**, activated at some of the managed treatment plants, including in relation to the biomethanisation power of the sludge (primary, secondary, etc.);
- the **commissioning of the thermal dryer at the Ostia water treatment plant**;
- the renovation of the **Fregene purification plant**, where the **DepurArt** project was developed in collaboration with the Innovation unit of Acea SpA's Technology & Solutions function (see also the dedicated box - *Research and innovation in Acea SpA*).

Satellite monitoring of water resources continued in protected areas, for detecting morphological variations (new constructions, earthworks, etc.) followed by the relevant verification activities.

During 2021, the company designed, created and commissioned an **innovative experimental plant for potable water that can remove arsenic**. In addition, with reference to **forecasting the availability of water resources**, Acea Ato 2 has implemented a **machine-learning algorithm based on the random forest technique** to identify meteorological proxies (temperature and/or precipitation) or management proxies (**volumes**) **correlated to the variability of the state of preservation of the resource, with reference to the different collection sources (springs, well fields, etc.)**.

With the support of a specialist firm, **Acea Ato 5** conducted an **energy analysis on one of the main well fields** managed and implemented a corrective action to significantly reduce the plant's energy consumption. A **predictive maintenance project was launched involving some key assets for the management of water systems** (external electric pumps in lifting stations) and sewage (compressors), with the installation of wireless sensors capable of carrying out real-time analysis to prevent irreparable breakdowns of the monitored assets and the consequent plant stoppages.

AdF has carried out:

- the completion of the experimental **Augmented Reality project, in coordination with Acea Innovation**, to approach the new technology on field processes and empower the frontline workforce;
- **massive remote reading of meters** across the territory through drive-by and walk-by reading, covering around 50% of the installed base of meters. In addition, an analysis platform (**NEX-Text**) has been developed as part of an internal project to control and monitor data from remote reading. This platform allows the analysis of field measurement information and instrument alarms, thus enabling effective asset management and detailed control of water consumption;
- the completion of a PoC aimed at defining a platform for managing and integrating data from smart meters, both drive-by and nbIoT, and no-meter sensors, with the aim of creating a **data hub, performing advanced management of events and alarms and feeding analytics systems**;
- the construction of a **centralised platform for the treatment of sludge from sewage treatment plants** by means of thermochemical hydrolysis.

As part of the **protection of water resources** effort, experimentation continued on various technologies concerning network efficiency, satellite monitoring of leaks, a **predictive methodology** (Rezatec algorithm) was implemented on the Grosseto municipal network was implemented **aimed at prioritising interventions and pre-locating leaks** which, on the basis of historical, geomorphologic and hydraulic data of the aqueduct graph, identifies the areas at greater risk of rupture; the installation of a system of multi-correlator geophones was also started with the same objective of promptly and accurately identifying leaks.

Finally, within the framework of internal projects implemented in agile mode, AdF has **developed two dashboards** integrated with SCADA systems and analytics tools, for **monitoring water requirements, planning water production, creating consumption forecast scenarios** using predictive algorithms, and for **monitoring the electricity budget** and the energy performance of the main plants.

GORI continued its implementation of **IoT technologies and advanced sensor technology** for environmental protection, with the installation of 300 sensors and remote monitoring of wastewater flood drains.

RESEARCH AND INNOVATION IN ENGINEERING AND SERVICES

In 2021, in collaboration with the Technology& Solutions Function of Acea SpA and the start-up BeamDigital, **Acea Elabori carried out experimentation on the Safety Check project**, for the remote monitoring of the safety conditions of the personnel working at the sites. Implementation continued of the **'Master Reclamation' project**, a data retrieval system able to retrieve customer master data, using machine learning and artificial intelligence, and automate internal data quality processes.

With reference to **business process innovation** in 2021, **Acea Elabo-**

ri's achievement of BIM (Building Information Modelling) certification for engineering design is of particular note. The BIM methodology employs intelligent digital models throughout all phases of a project's life cycle and works on seven dimensions, visualising not only progress and costs, but also the sustainability of the project and encouraging the implementation of choices oriented towards a positive impact on the environment.

Numerous other projects have been carried out by Acea Elabori for Group companies.

RESEARCH AND INNOVATION IN THE ENVIRONMENT AREA

In 2021, the following research and innovation activities carried out by the Environment business are worth mentioning:

- the completion of experimental activities for the development of a plant solution aimed at **recovering sodium bicarbonate and calcium chloride dihydrate** (reaction by-products) from the treatment of Residual Sodium Carbonate (RSC), deriving from the neutralisation phase of the acid fumes produced by the waste-to-energy plants, currently under contract, and the start of activities to define the industrial *scale-up*;
- The completion of **experimental activities for the treatment of fly-ash and bottom-ash** for the recovery of the inert fraction

present and treatment for the reduction of hazardous characteristics, and initiation of activities to define the industrial *scale-up*;

- the filing of the application for an **experimental authorisation** for the **plasmix treatment pilot plant**. The plant is part of a much larger project to sustainably recover mixed plastics (plasmix) and transform them, through the GASIFORMING™ process, into pure methanol that can be sold on the market. The project implements circularity: it recovers material from waste destined for landfill or waste-to-energy, vertically integrates the plastics chain, and produces methanol from a renewable source.

