

## The capital expenditures

NFS

During the first half of 2023 the ATM Group made investments of approximately EUR 202.4 million (including investments by Metro Service A/S), of which approximately EUR 155.3 million was earmarked for fleet renewal, including extraordinary maintenance for the general overhaul of trams.

Below are the investments made by the ATM Group over the three-year period, broken down by macro-category:

	2023	2022	2021
<i>Fleet renewal</i>	155.3	63.9	47.7
<i>Extraordinary building maintenance</i>	5.3	1.9	1.5
<i>Modernisation and upgrading of facilities and infrastructure</i>	24.7	11.6	14.8
<i>New technologies for payment and mobility info</i>	17.1	8.2	8.7
<b>Total</b>	<b>202.4</b>	<b>85.6</b>	<b>72.7</b>

The investments made by the Group are aimed at generating positive spin-offs in terms of the performance of transport services and improving environmental performance and vehicle safety levels. Among the impacts pursued by the Group's investment strategy is the improvement of the *customer experience* and the reduction of atmospheric emissions from fossil fuels.

Regarding the renewal of the metro fleet, the contracts signed in 2022 with HITACHI RAIL for the supply of 46 new trains for Line 1 (no. 21 trains, replacing the "Revamping" trains) and Line 3 (no. 25 trains, of which 21.5 to replace the oldest part of the fleet and 3.5 to increase the equipment) entered the executive phase in 2023. The supply of the new trains will be entirely publicly subsidised. The programme to purchase trains for the M3 metro line is part of the broader project to upgrade the line, together with the new signalling system; this project is also the subject of specific funding.

As part of the 'Full Electric' plan to renew the bus fleet, ATM signed a framework agreement in 2019 to supply 250 electric vehicles. As of 31 December 2023, 216 buses have been delivered under this agreement and the completion of the delivery will take place during 2024. In the framework agreement, the replacement of the supply batteries is foreseen at about mid-life of the vehicle.

Following the allocation of the PNRR funds (measure M2C2 - 4.4.1 Renewal of green bus and train fleets - BUS sub-investment) to the Municipality of Milan, the procedures for the acquisition of additional electric buses, 12 and 18 metres, were started in the second half of 2022, with the publication of the relevant tender. At the end of 2023, the procedure was completed with the signing of contracts for 153 12-metre and 105 18-metre buses, with deliveries starting in mid 2025.

At the same time, adjustments are being made to the spaces and infrastructure for depots of and recharging electric vehicles. To this end, a five-year framework agreement was signed for the installation of charging stations at the Sarca, Giambellino and San Donato depots, as well as the installation of *opportunity chargers* at the main terminals of the automobile service and inside ATM depots. In the course of 2023, activities for the installation of charging stations were completed: 75 charging stations in the Sarca depot, 90 in the San Donato depot, 75 in the Giambellino depot; the installation of 18 *opportunity chargers* has also been completed, of which 14 at terminus points (6 in Viale Zara, 4 in P.za IV Novembre - Centrale, 4 in P.za Bottini/v. Viotti - Lambrate) and 4 within the depots (2 in

Giambellino, 2 in Sarca). As of 31 December 2023, a total of 240 charging stations and 18 *opportunity chargers* are therefore available. In the course of 2023, work started on the construction of the recharging infrastructure at the Palmanova depot. By the end of 2024, the installation of a further 50 pantograph stations and two fast-charge stations is planned.

Against the backdrop of the 'Full Electric' plan investments and in pursuit of its 'ecological mission', ATM has signed a contract to supply electricity produced from renewable sources, certified as Green Energy with Guarantee of Origin.

The Group's investment strategies in surface vehicles also include, as an intermediate step, the purchase of hybrid vehicles, both because the market is not yet able to meet the large demand for electric buses, and to comply with regulations, which set time limits on the use of older diesel vehicles. In this context, it should be noted that the deliveries scheduled under the framework agreement for 150 vehicles assigned at the end of 2021 (including full maintenance service extended to the entire life of the vehicle) of 150 12-metre hybrid buses were completed in 2023.

Given the fleet evolution detailed above, as of December 2023, ATM S.p.A.'s urban bus fleet consists of: 56% diesel, 24% hybrid, 20% electric<sup>7</sup>. The goal is to have, when fully operational, a total of 1,200 electric vehicles, so as to create a '*Zero Emission Zone*' that will allow, on the one hand, the reduction of diesel consumption by 30 million litres per year and, on the other hand, the reduction of CO<sub>2</sub> emissions by approximately 75 thousand tonnes per year.

The railcar fleet is also the subject of a significant modernisation project. Against the framework agreement for the supply of 80 18-metre vehicles (of which 30 will be delivered between 2019 and 2020), a second application contract for a further 50 trolleybuses was signed in November 2021, with the first delivery taking place at the end of 2022. As of 31 December 2023, 30 vehicles have been delivered and the entire batch is expected to be completed by 2024. The acquisition is covered by funding from the Ministry of Infrastructure and Transport allocated to the Municipality of Milan. In December 2022, with further PNRR funding (measure M2C2 - 4.2 Rapid mass transport development) granted by the Ministry of Infrastructure and Transport to the Municipality of Milan, a third application contract was signed for the supply of a further 10 trolleybuses.

With these investments and the concomitant decommissioning of all old 12- and 18-metre vehicles, the average age of ATM's trolleybus fleet will drop to around four years.

As part of the renewal of the tram fleet, a framework agreement is in place for the supply of 80 bi-directional 25-metre trams for use on the urban and Regional network. In this context, a first application contract was concluded for 30 trams (10 intercity and 20 urban): As of 31 December 2023, eight trams have been delivered and are being tested and fine-tuned. In addition, to complete the replacement programme for 50 urban trams, two further application contracts were signed for a further 30 urban trams. The investment is co-financed by the Ministry of Infrastructure and Transport.

Finally, in mid 2023, following a call for tenders, a new contract was signed for the purchase of fourteen 35 m trams, fully financed with PNRR funds (measure M2C2 - 4.2 Development of rapid mass transport), to serve the future "interperipheral northern" line (line 7).

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<sup>7</sup> The percentages are calculated with reference to the vehicle allocation (including vehicles not yet available for operation).

The new trams and trolleybuses purchased will offer customers a better quality of service, in terms of comfort and accessibility; they will be upgraded to the latest safety requirements, equipped with an anti-collision system and technological systems to enable network connectivity. They will also ensure the mitigation of noise emitted into the environment, and, thanks to the braking energy recovery system, guarantee energy savings.

Also, as part of the renewal of the vehicle fleet and with a view to sustainability, the replacement of diesel service cars with rented electric cars continues. These are used for servicing vehicles on the line, operational control and maintenance work on metro and tram systems. As at 31 December 2023, the fleet consisted of 116 cars.

As far as works on installations are concerned, it is worth highlighting the project to upgrade the M2 metro line, 60% co-financed by the State, which saw ATM take over from the Municipality of Milan to finance the remainder. The project concerns the renewal of the electric traction and power supply systems of the Cascina Gobba-Cologno Nord section, which started in 2020 and ended in 2023. The installation of the Cantalupa Electrical Substation is underway.

ATM also carries out, on behalf of the Municipality of Milan, a series of works on infrastructures owned by the Municipality, including works related to the renovation of the M2 underground line, and more specifically:

- the complete overhaul of the signalling system, the tender for which, awarded in the first half of 2020, was subsequently subjected to technical-administrative and legal audits by a third party. These verifications, which confirmed the correct handling of the tender procedure, allowed the contract to be signed in September 2021 and the start of design activities by the supplier in November 2021. The project aims to ensure a safer and more efficient operation of the service, to allow an increase in the frequency of trains passing through and, consequently, to increase the transport capacity of the line. The work is fully financed by ministerial contributions and the City of Milan;
- reinforcement renovation works. The works, which began in the summer of 2021, are aimed at renovating certain sections of the line in which the mechanical components have deteriorated in performance or have been built with technical solutions that do not allow the planned increase in speed from 70 km/h to 85 km/h. The work is almost entirely financed by ministerial contributions and the City of Milan. In the course of 2023, work on the renewal of the M2 Cascina Gobba-Cologno Nord/Cascina Gobba-Gessate section of the external section will be completed.

Finally, ATM is carrying out a complete overhaul of the signalling systems on the M3 metro line. This intervention, together with the renewal of the fleet, will contribute to the modernisation of the "yellow" line. A call for tenders was launched in 2021 and awarded in April 2022. On 6 May 2022, the urgent start of the works was realised to allow the development of the design activities by the Contractor, and on 28 September 2022, the signing of the contract with the Contractor took place. The intervention is fully financed by the Ministry of Infrastructure and Transport.

The design phase for the renovation of the fire-fighting systems in the tunnels and stations of the M1 and M2 metro lines was also completed. The interventions are co-financed by the Ministry of Infrastructure and Transport and the Municipality of Milan and are aimed at adapting the existing

systems to the new regulatory references on fire prevention, as identified by Ministerial Decree 21/10/2015. At the end of 2023, contracts were also signed for the construction of compartmentalisation works and the new fire-fighting water system in the stations and tunnels of the M1 line between Molino Dorino/Inganni and Sesto F.S. and the M2 line between Romolo and Crescenzago. In 2023, new fire detection and alarm systems were installed, replacing the existing ones, in 35 stations on the M1 line (Molino Dorino/Inganni - Sesto F.S. section) and in 17 stations on the M2 line (Romolo - Crescenzago section) and a new lighting and motive power system has been installed in the tunnels of the M2 line between the Cimiano and Romolo stops. Finally, the power supply and cabling lines of the light channels making up the lighting system of the areas open to the public in 34 stations on the M1 line and 14 stations on the M2 line have been rebuilt. ATM was in charge of coordinating all phases of the activity, from the executive and construction design to the supply of materials and the execution of the works.

In the area of equipment investments, the following are worth mentioning:

- the project to renew and upgrade (new installation and replacement) the wheel reprofiling equipment of metro trains. This intervention requires specific planning and major civil works for the installation of machinery in the processing pits. The project started with the installation of a new, modern wheel-turning station at the Gallaratese M1 depot; work is still in progress to replace the equipment at the Gorgonzola M2 and San Donato M3 depots, where machines capable of reprofiling the four wheels of a trolley at the same time will be installed. The project will then conclude with the replacement of the system at the Precotto M1 depot;
- as part of the renewal of the fleet of operating machines, the authorisation procedures for the purchase of 7 battery-operated electric shunting locomotives to be used for the movement of underground trains within depots and between workshops and depots in the absence of power supply to the lines were started in 2023. In line with the Full Green transition project undertaken by ATM, these vehicles will replace the outdated traditional diesel shunting locomotives. The subsidiary Rail Diagnostics also started a similar procedure for the acquisition of a locomotive, identical to its predecessors, for the handling needs of the railway wagons used for track maintenance activities.

Investments also include the ticketing revolution in Local Public Transport, of which ATM is the leader. The digital transformation of Milan's public transport is now at a turning point in ticketing; in fact, ATM is taking a further step in the contactless payment revolution. After two years of operation in the metro, the contactless payment system was subsequently also activated on all Atm bus, tram and trolleybus lines and is being extended.

With regard to the bus fleet of the NET subsidiary, an ecological transition to more environmentally friendly vehicles had begun in 2022. In 2023, the supply of 9 low-floor hybrid buses purchased under the ATM Framework Agreement was completed; in addition, 2 Euro 6 high-floor buses joined the NET fleet. The delivery of 7 partially low-floor hybrid buses was also planned for 2023, which, due to material procurement difficulties, were rescheduled for the beginning of 2024.

Also, during 2023, a new contract was signed for the supply of 15 hybrid buses, which are scheduled to be delivered in the second half of 2024.

Finally, as far as electric buses are concerned, thanks to the availability of public funding under the PNRR and the National Strategic Plan for Sustainable Mobility, a framework agreement was signed in

November 2023 for the supply of 30 electric vehicles; at the same time, the first two application contracts were also signed for the purchase of 15 electric buses, representing the company's first step towards conversion to electric engines.