



FCC Servicios Medio Ambiente Holding
Green Bond Framework
November 2019

1. Introduction

FCC Servicios Medio Ambiente Holding (“FCC”) is one of the largest environmental services companies in the world, operating since 1911. We provide urban sanitation services to Europe, Africa and America through FCC Servicios Medio Ambiente Holding (Spain), FCC Ambito (industrial waste management and soil recultivation), FCC Environment UK, FCC Environment (CEE) and FCC Environmental Services (USA). We operate in over 5,000 municipalities globally serving 600m people. We are a division of FCC Citizen Services who also operate in the Water and Infrastructure sectors.

Our services include: collection, treatment, recycling, energy recovery and disposal of solid urban waste, street cleansing, sewer network maintenance, ground maintenance and preservation of green spaces, polluted soils recovery and comprehensive management of industrial waste.

2. Background on the FCC Environment’s commitments and environmental policies

FCC is focusing on technological innovation to improve people’s quality of life and to make cities ever more sustainable. We have been a pioneer in many aspects of environmental services, developing more sustainable vehicles, utilizing treatment technologies to improve recycling and creating the sector’s most comprehensive services management platform. Improving environmental quality is a core objective in FCC’s service delivery. It is because of this attitude that FCC was awarded “Excellence in Recycling & Waste Management” in the UK, 2018.

2.1 FCC Servicios Medio Ambiente Holding Environmental Considerations

Solid Waste Collection: FCC operates an advanced fleet of vehicles equipped with a variety of innovative technologies such as electric, hybrid and natural gas propulsion powering more than 1,500 vehicles. Other key technologies include soundproofing of compaction compartments, automated lifting of containers, multiple moveable axles to improve manoeuvring and safety systems for operators.

Recycling: FCC employs a wide variety of technological solutions to ensure the highest quantity and quality of material recuperation. Multi-compartment collection vehicles, serve over 100 recycling plants worldwide, operating in many cities allow for the simultaneous collection of multiple waste fractions. Household waste recycling centres, including mobile facilities, allowing people to deposit all sorts of waste including paint, solvents, used clothing, aerosols, oils, etc. A variety of waste sorting and treatment facilities combine mechanical and manual technologies to separate recyclable materials for subsequent treatment and reuse.

Educational campaigns complement these technologies to ensure that the public is informed as to best practices regarding how to separate waste for recycling. This combination of communication and technology has led to recovery rates rising over 30% in recent years.

Waste Treatment, Energy Recovery and Disposal: At FCC, we treat waste as a resource, reusing and recycling everything possible and making use of the energy value of the remaining fraction when possible. FCC operates a wide variety of treatment facilities including mechanical separation, composting, biological treatment and energy-from-waste plants. In many locations, multiple technologies are combined to ensure the most complete waste recovery possible.

More than 130 landfills receive the fraction of waste left after recycling. Biogas is captured from the landfills to produce energy and the company is in the process of installing wind turbines at landfill sites to further increase energy production. These 10 existing waste-to-energy projects have an annual capacity of 2.6m tons annually with a potential power output over 300MWe.

Street Cleaning: Clean-energy vehicles are designed to move through city centres with minimum noise and emissions, helping to remove rubbish and create a clean environment. FCC has driven the technological development of new electric self-propelled machines for street cleansing services, in order to reduce the negative impacts of these services on citizens. Saving resources is a priority for FCC. For that purpose, FCC also includes water saving systems on the vehicles and machinery for street cleansing services.

FCC has incorporated innovative self-propelled machinery with water-saving and energy-saving solutions, including self-propelled electrical machinery.

Maintenance of Parks, Gardens and Green Areas: FCC maintains more than 3,500 hectares of parks, gardens and other green areas using green vehicles and sustainable technology that provides efficient use of water as well as protection of biodiversity.

Sewer Maintenance: FCC maintains more than 10,000 kilometres of sewers that provide service to more than six million people. This activity requires strong technical capabilities and high-quality resources. Vacuum trucks clean and unblock sewer lines while remote inspection and repair equipment is used to ensure that the networks continue to function correctly. The vehicles form part of the company's green fleet. FCC achieved a 100% EV fleet of vehicles (including light, medium and heavy duty non-commercial and self-developed vehicles) for the Sewer Maintenance and the Fountains maintenance of Barcelona.

Industrial Waste: FCC manages and processes industrial waste streams, promoting recycling and reuse whenever possible. We are specialists in soil decontamination helping to protect and improve the environment.

Beach Maintenance: FCC safeguards the environmental quality of more than 1,200 kilometres of coastline by cleaning beaches. Specialized teams operate combing beaches for any refuse left over from the previous day's activity. Likewise, boats equipped with nets pass along the coast picking up floating waste. With this combination of land and sea operations FCC ensures maximum cleanliness in coastal areas, recovering more than 120,000kg waste from the sea every year.

Sustainable Vehicles: FCC is the world leader in developing sustainable vehicles for environmental services. Our cutting-edge R&D department has consistently brought to market superior propulsion technologies that have resulted in cities ever more free of emissions and noise. FCC was a pioneer in this area putting its first electric vehicles in service more than 40 years ago. Today, FCC operates more than 2.200 sustainable propulsion vehicles including 100% electric models as well as hybrids and natural gas powered vehicles. As the FCC sustainable fleet grows the company is progressively reducing its environmental footprint accordingly.

Technological Innovation: FCC has implemented an R & D and innovation Management System through which it has developed a large number of projects. The most relevant projects are: the development of electric vehicles for urban services and the VISION platform, that drives intelligent and efficient services management, employing on-board devices that integrate control systems and communications to make FCC's fleet exceptionally efficient. The system works in real-time gathering, transmitting and analysing massive volumes of data generated automatically by workers, the public, environmental services vehicles and equipment. This information is then utilized to drive resource optimization and ensure delivery of the highest-quality environmental services possible. The VISION management platform covers the full range of environmental services, from collection to street cleaning to the maintenance of green areas.

3 FCC Servicios Medio Ambiente Holding Green Bond Framework

As part of our commitment to sustainability as described above, FCC has elected to create a Green Bond Framework (the "Framework"), which is in accordance with the 2018 ICMA Green Bond Principles, under which FCC Servicios Medio Ambiente Holding can issue Green Bond(s).

For each Green Bond issued, FCC asserts that it will adopt the following, as set out in this Framework:

- (i) Use of Proceeds
- (ii) Project Evaluation and Selection
- (iii) Management of Proceeds
- (iv) Reporting

This Framework may be updated and amended from time to time in the manner described in Section 5 (Amendments to this Framework) below. Any such updated and amended Framework will be published

on the FCC's website and will replace this Framework. Accordingly, any Green Bond(s) then outstanding will be subject to any such updated and amended Framework.

i) Use of Proceeds












An amount equal to the net proceeds of any Green Bond(s) issued by FCC will be allocated to finance new or re-finance existing¹ projects/expenditures, in part or in full, which qualify under as an Eligible Green Project as set out below.

Eligible Green Projects are those projects which are funded, in whole or in part, and whether directly or indirectly from FCC. They will include investments expenditures, and operating expenditures, insofar as any expenditure that provides clear environmental benefits and promotes the transition to low-carbon technologies.²

Eligible Green Project category ¹	Eligibility criteria ³	Example projects ³
Pollution prevention and control	<ul style="list-style-type: none"> • Waste collection and management projects <ul style="list-style-type: none"> ◦ Recycling and waste diversion programmes • Waste-to-energy projects <ul style="list-style-type: none"> ◦ Generation of green energy from waste • Waste processing projects <ul style="list-style-type: none"> ◦ Processing waste in a sustainable way, avoiding landfill 	<ul style="list-style-type: none"> - Rubbish collection from streets, parks, beaches and the sea - Waste composting projects - Waste sorting - Tire recovery projects - Waste sorting and treatment facilities - Waste-to-energy facilities
Renewable energy	<ul style="list-style-type: none"> • Construction, generation, or purchase of renewable energy from wind and solar 	<ul style="list-style-type: none"> - Wind turbines at old landfill sites. - Active degassing in landfills. - Solar panels in work centres for self-consumption
Energy Efficiency	<ul style="list-style-type: none"> • Investment in projects leading to increase in energy efficiency by 30% 	<ul style="list-style-type: none"> - Energy efficiency in lighting
Clean Transportation	<ul style="list-style-type: none"> • Procurement of electric and hybrid vehicles • Procurement of natural gas fuelled heavy vehicles 	<ul style="list-style-type: none"> - Fleet of c.2,200 electric, hybrid and natural gas powered vehicles
Terrestrial and aquatic biodiversity conservation	<ul style="list-style-type: none"> • Construction or purchase of facilities and technologies for ground remediation projects 	<ul style="list-style-type: none"> - Remediation of old landfills. - Treatment of contaminated soil. - Treatment of contaminated water. - Maintenance and conservation of parks, gardens and green areas.

1. <http://www.icmagroup.org/Regulatory-Policy-and-Market-Practice/green-bonds/green-bond-principles/>
 2. <https://www.un.org/sustainabledevelopment/sustainable-development-goals/>
 3. <http://www.fcc.es/en/presentation-environment>

Alignment of Use of Proceeds with the UN SDGs

		Primary UN SDG targets
Pollution prevention and control	   	<p>12.2: Achieve the sustainable management and efficient use of natural resources</p> <p>12.5: Substantially reduce waste generation through prevention, reduction, recycling and reuse</p>
Renewable energy	 	<p>7.1: Ensure universal access to affordable, reliable and modern energy services</p> <p>7.2: Increase substantially the share of renewable energy in the global energy mix</p>
Energy Efficiency		<p>7.3: By 2030, double the global rate of improvement in energy efficiency</p>
Clean Transportation	  	<p>9.2: Promote inclusive and sustainable industrialization</p> <p>9.4 Upgrade infrastructure and retrofit industries to make them sustainable, with increased resource-use efficiency and greater adoption of clean and environmentally sound technologies and industrial processes</p>
Terrestrial and aquatic biodiversity conservation		<p>15.5: Take urgent and significant action to reduce the degradation of natural habitats, halt the loss of biodiversity and, by 2020, protect and prevent the extinction of threatened species</p>

Excluded Projects

For each Green Bond issued, FCC Servicios Medio Ambiente Holding asserts that it will not use the proceeds for:

- New Landfills;
- Incineration activities:
 - Waste-to-energy (WtE) facilities that incinerate recyclable materials (included WtE projects only treat rejections of treatment facilities and / or non-recyclable materials from selective waste collection)
 - WtE facilities with an R1 value of energy efficiency < 0.65

ii) Project Evaluation and Selection

The Project Evaluation and Selection Process will ensure that the proceeds of the FCC Green Bond(s) are allocated to new lending or existing projects/expenditures that meets the criteria set out above in Section i), Use of Proceeds.

FCC will set up a Green Bond Working Group (GBWG) to carry out the evaluation and selection process. The GBWG will consist of members from:

- Administración y Finanzas (Administration and Finance)
- Sistemas de Gestión (Management Systems including environmental and sustainability experts)
- Estudios y Contratación (Studies and Hiring)
- Maquinaria (Machinery)
- Asesoría Jurídica (Legal)

The GBWG will be chaired by Director de Económico (CFO).

On a biannual basis, the GBWG will consult with other FCC departments (as necessary) to identify and recommend eligible projects or expenditures for inclusion as Eligible Use of Proceeds.

On a biannual basis, the GBWG will review all proposed Eligible Use of Proceeds to determine their compliance with the FCC Green Bond Framework in order to approve the allocation of proceeds.

On a biannual basis, the GBWG will review the allocation of the proceeds to the Eligible Use of Proceeds and determine if any changes are necessary (for instance, in the event that projects or expenditures have been cancelled, sold or otherwise become ineligible).

The GBWG will also review the management of proceeds (as described in Section iii) and facilitate reporting (as described in Section IV).

iii) Management of Proceeds

FCC Servicios Medio Ambiente Holding will be responsible for the issuance of Green Bonds. Pending its allocation to Eligible Green Projects, FCC will temporarily hold an amount equal to the unallocated proceeds of any Green Bond issuance in its accounts. FCC will oversee the allocation and tracking of expenditures on Eligible Green Projects up to an amount equal to the net proceeds of Green Bond(s) issued.

To manage this oversight, FCC will establish a Green Bond Register. The proceeds of each FCC Green Bond will be deposited in FCC's general funding accounts and earmarked for allocation in the Green Bond Register.

The Green Bond Register will be reviewed biannually by the FCC.

The Green Bond Register will contain relevant information including:

- (1) Details of the Bond(s): ISIN, pricing date, maturity date, etc.
- (2) Details of Eligible Use of Proceeds, including:
 - Eligible Green Projects
 - Amount of allocation made
 - Other necessary information so that the aggregate of issuance proceeds allocated to the Eligible Use of Proceeds is recorded at all times
 - Estimate of impact of the Eligible Use of Proceeds

iv) Reporting

An annual allocation reporting will be made publicly available within one year of issuance of any FCC Green Bond(s), which details the allocation of the net proceeds from any outstanding issuance. The allocation report will include the following details:

- Total amount allocated to Eligible Green Projects;
- Total amount allocated per Eligible Green Project Category;
- The amount remaining unallocated.

In addition, FCC will provide impact reporting on the expected environmental impacts of the Eligible Green Projects, in line with the best practice guidance on impact reporting. Impact reporting will be made available on an annual basis, subject to the availability of the relevant data.

Potential key environmental impact indicators include:

Eligible Project Categories	Potential Impact Metrics
Pollution Prevention and control	<p>Waste collection & processing projects</p> <ul style="list-style-type: none"> • Annual absolute (gross) amount of waste that is separated and/or collected, and treated (including composted) or disposed of (in tonnes p.a. and in % of total waste) <p>Waste-to-energy projects</p> <ul style="list-style-type: none"> • Annual energy generation from waste in energy/emission-efficient waste to energy facilities in MWh/GWh (electricity) and GJ/TJ (other energy) • Energy recovered from waste (minus any support fuel) in MWh/GWh/KJ of net energy generated p.a.6 • GHG emissions from waste management in tCO₂e • R1 value of energy efficiency
Renewable energy	<ul style="list-style-type: none"> • Annual GHG emissions reduced/avoided in tonnes of CO₂ equivalent • Annual renewable energy generation in MWh/GWh (electricity) • Capacity of renewable energy plant(s) constructed in MW • Annual Absolute (gross) GHG emissions from the project in tonnes of CO₂ equivalent
Energy efficiency	<ul style="list-style-type: none"> • Percentage increase in energy efficiency • Annual GHG emissions reduced/avoided in tonnes of CO₂ equivalent
Clean transportation	<ul style="list-style-type: none"> • Annual Absolute (gross) energy consumption (GJ) • Annual GHG emissions reduced/avoided in tCO₂e • Annual Absolute (gross) GHG emissions in tCO₂e • Number of clean vehicles deployed (e.g. electric) • Estimated reduction in fuel consumption
Terrestrial and aquatic biodiversity conservation	<ul style="list-style-type: none"> • Annual treatment of soil (tonnes) • Annual treatment of water (litres) • Amount of pollutants removed from soil (kg/tonne) • Amount of pollutants removed from water (kg/l) • Area of land treated (hectares)

All reporting will be made public on FCC's website <https://www.fccma.com/es/>.

4. External Review

4.1 Second Party Opinion

FCC will engage an External Reviewer to provide an external review in the form of a Second Party Opinion on the FCC Servicios Medio Ambiente Holding Green Bond Framework, and confirm alignment with GBP.

This Second Party Opinion will be made public at <https://www.fccma.com/es/>.

4.2 External Verification

FCC is committed to engage an assurance provider, or an External Reviewer to assess the compliance the bonds issued against the FCC Green Bond Framework on annual basis.

The resulting report will be made public at FCC's website <https://www.fccma.com/es/>.

5. Amendments to this Framework

The GBWG will review this Framework on a regular basis and such review may result in this Framework being updated and amended. The updates, if not minor or technical in nature, will be subject to the prior approval of the FCC Servicios Medio Ambiente Holding and Director Económico (CFO). The updated Framework, if any, will be published on FCC's website and will replace this Framework.