

MAKING
THE PLANET
SUSTAINABLE
IS THE BEST
JOB ON EARTH



PPP MODELS FOR WATER AND SEWERAGE SERVICES IN EUROPE- OSTRAVA CASE

WB-EBRD

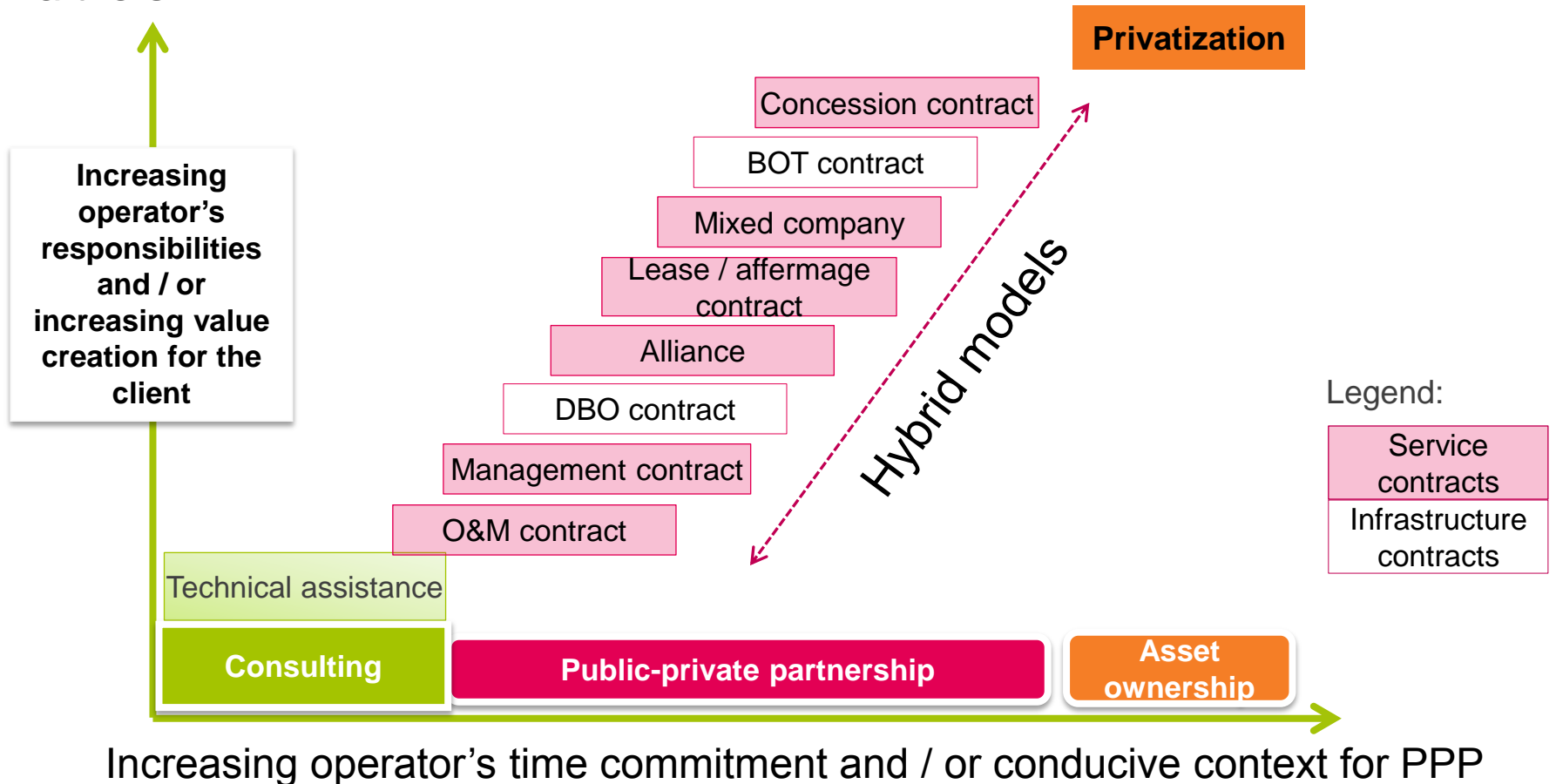
GENEVE, OCTOBER 21, 2014



INNOVATE TO REINVENT OUR MODELS

SE developed a new generation of PPP contracts over the last years:

- **Operational assistance** (Haïti) or **Management contract** (Algiers, Jeddah)
- **Performance based** (New Delhi) or **Alliance** (Adelaide, Perth)
- **Mixed company** (Spain, Latin America, Italy, Czech Republic, ...)
- **Concession** (Bayonne USA) or joint venture (Qingdao) with local Authorities or Partners



PPP IN WATER UTILITY: OVAK a.s. (CZ)

- **Ostrava** - regional capital of the Moravian-Silesian region, Czech Republic (north-eastern part)
- **Third biggest city in CZ**, 214 km², 300 000 inhabitants
- **Former heavy industrialized city** due to coal mines and metallurgical factories, partially restructured but still important presence of different kind of heavy and light industry (ironworks, steelworks, chemical industry, machinery, coking plant)

OVAK a.s. (CZ) AT A GLANCE

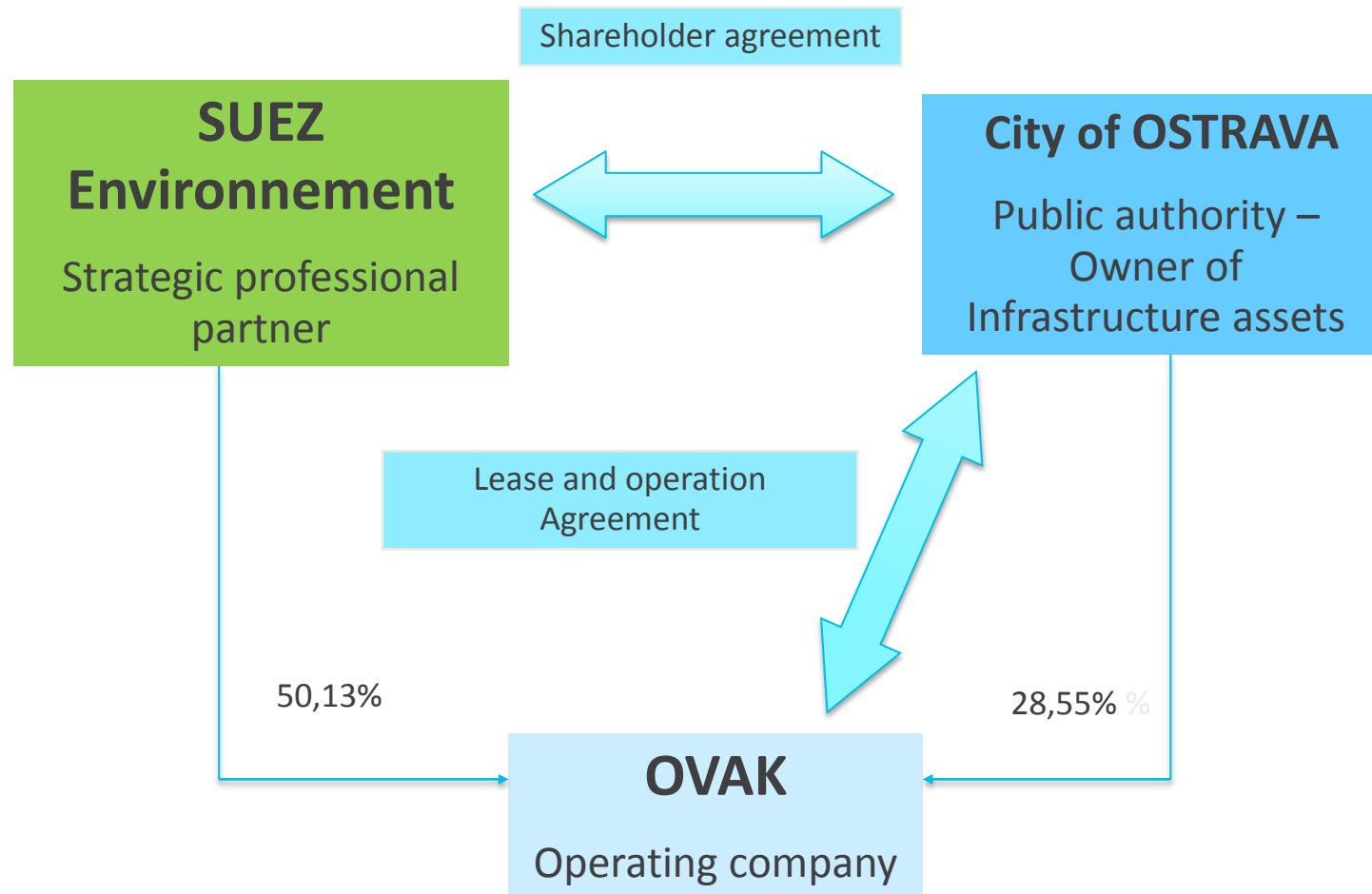


KEY ELEMENTS OF THE PPP

- **1992 – establishing of OVAK – shareholding company by transformation of former state owned company during the national privatization process**
- **1994 - Suez Environnement became a minority shareholder based upon the offer submitted to Czech National Property Fund controlling the privatization process**
- **Initial parts of shareholders:**
 - 33% Municipal
 - 33% Czech citizens
 - 33% Lyonnaise des Eaux
- **Current parts of shareholders (20 years after):**
 - 28,5 % Municipal
 - 21, 4 % Czech citizens
 - 50,1 % Suez Environnement



RELATIONSHIP BETWEEN MAJOR SHAREHOLDERS OF OVAK a.s.



CONTRACTUAL DISPOSITIONS BETWEEN THE CITES OF OSTRAVA AND OVAK a.s.

- **Lease of technical infrastructure asset => payment of rent to the City of Ostrava**
- **Creating added value on the operation of technical infrastructure => operator (OVAK a.s.) ensures all standards (legal, customer expectation, technical, tariff) and generate economic sustainability by optimization of operation and implementation of good practices**
- City of Ostrava has a legal obligation to reinvest the received rent (approximately 9,5 mil. EUR/year) to the renovation or extension of the infrastructure. Another 4 mil. EUR/year are invested by the operator (OVAK as) as repairs/renovation works => **sustainable state of asset**
- Long term contract until the end of 2024 (originally signed for 30 years)
- Tariffs are determined in conformity with:
 - 1) formula stated in the Lease & Operation Agreement
 - 2) profit and cost regulation given by national Czech legislation

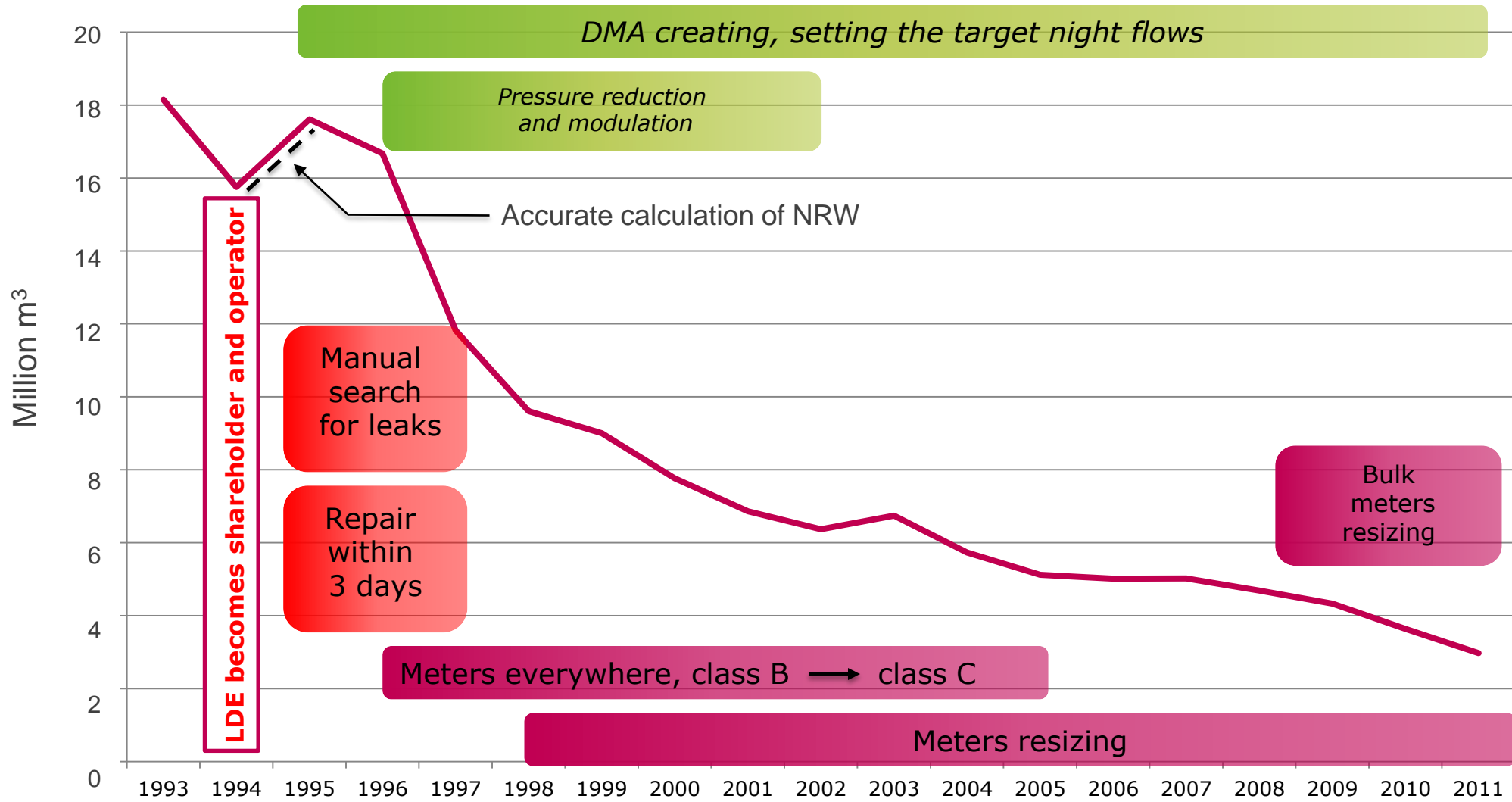


CONTRIBUTION OF THE STRATEGIC PRIVATE PARTNER

- **Multi-level knowledge and good practices transfer, technical assistance in all fields** (general management, customer management, waste water treatment rehabilitation project and operation, water treatment plan rehabilitation project, good practices for network operation, ...)
- **HR policy** set up according to good international managerial practices but in conformity with local practices
- **H&S** audits and strict safety policy
- **Energy efficiency measures**
- **Non Revenue Water (NRW) policy**
- **Smart technology** put in practice



EXAMPLE: EVOLUTION OF NON REVENUE WATER



NON REVENUE WATER FIGURES

Year	Supplied Mm ³ /y	Billed Mm ³ /y	Consumption l/inhabitant x day	NRW %	NRW with 1993 billed volume %	NRW Mm ³ /y	Linear leakage index m ³ /day x km
1993	52.5	34.4	285	35	35	18.2	46.7
2011	20.2	16.9	150	15	8	3.0	7.8
Reduction by				57%	77%	84%	83%

KEYS FOR SUCCESS

A mix of technical and managerial measures with optimal use of operational CAPEX

Technical measures

- Creation of 80 DMAs (from 100 to 3 km)
- Setting of target night flow per DMA
- Creation of pressure zones (66 PRV), night regime on some
- Data centralization in SCADA
- Renewal of customer meters (from class B to C)
- Downsizing of water meters



Managerial measures

- Motivation program for on-field staff (fighting leaks and fraud)
- Reorganizing teams to fix visible leaks within 3 days
- Discipline in reading and billing
- Negotiation with bulk water suppliers (meters renewal)
- Training program to all staff



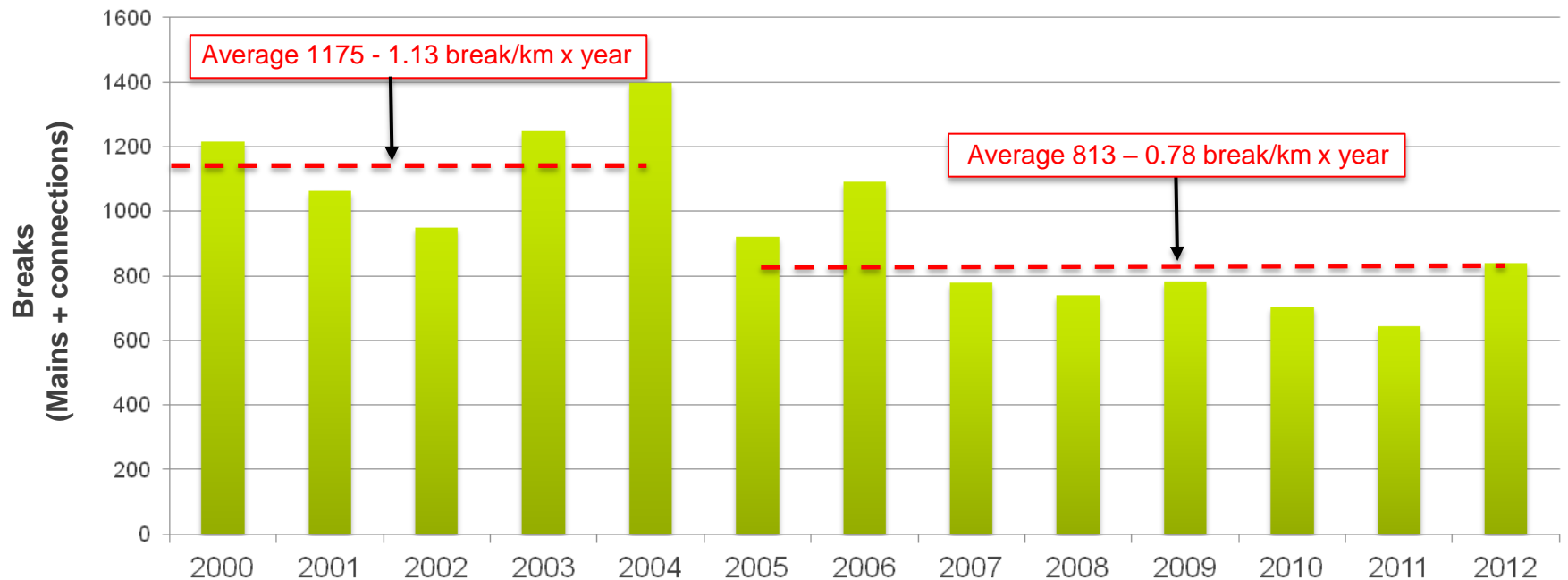
KEYS FOR SUCCESS

A mix of technical and managerial measures with optimal use of operational CAPEX

Operational CAPEX

- Chambers and sector meters for DMAs
- Valves renewal
- Meters renewal
- Field equipment: compressors, hammers, mini excavators, acoustic correlators, acoustic loggers...
- Vehicles, computers, dedicated software
- Optimized renewal of water network using PREVOIR system (asset management)

Evolution of breakage rate



KEY ELEMENTS FOR A LONG-TERM PP PARTNERSHIP

- As a shareholder, the City participates to the governance of the operating company OVAK => complete transparency and mutual confidence of partners (City and SE)
- **Balanced governance** of the company:
 - Composition of Board of Directors: 3 delegates from City of Ostrava, 3 delegates from Suez Environnement and 1 agreed-upon delegate.
 - Composition of Supervisory Board: 2 delegates from City of Ostrava, 2 delegates from employees, 2 delegates from Suez Environnement





THANK YOU !

MAKING THE PLANET
SUSTAINABLE
IS THE BEST JOB
ON EARTH



Zdeněk SLADOVNÍK
zsladovnik@ostrava.cz
Diane D'ARRAS
Diane.darras@suez-env.com