



Environmental responsibilities & Sustainability

❑The company's environmental strategy targets by 2030 The environmental dimension should be a main focus in all sectors of the company in a way that achieves the security of resources and supports the fairness of their use and optimal exploitation of them, the production of products that are less dependent on carbon, the reduction of pollution and emissions, and the achievement of integrated management of waste and investment in it. Interaction with the external biosphere



□ SUSTAINABLE DEVELOPMENT

Environment



The company's environmental policy emphasizes the importance of linking sustainable development and the environment with all its pillars and the main indicators and directions of the state's general policy, with a commitment to applying environmental feasibility measures for projects, programs and future development activities.



Economy



Society

S

W

O

T

The company owns the largest industrial complex in the October industrial zone, 365 acres

Weak culture and awareness among workers about what the Green economy is & environmental sustainability and how to apply

Taking decisions to expand production projects that are environmentally sustainable in support of reducing carbon

Negative environmental impact from Activities Neighboring to the company

The company's articles of association are freed from the public business sector constraints of the of the investment sector system

having sometimes deviation from the emissions acceptable percentage in the work environment

The presence of large unused areas in the industrial complexIt can be used to create clean energy projects to reduce carbon levels

Environmental laws and the multiplicity of standards and their change

The company is led by a board of directors that has a strategic vision and advanced economic & environmental thought, which made the company one of the 100 most powerful companies in the Middle East on the FORBES list for the year 2021.

Exploitation and recycling of waste in a manner of partnership with specialized companies to benefit from tax exemptions for the Waste Management Regulation Law No. 202 of 2020

Several Regulatory bodies and overlapping jurisdictions

Availability of technical personnel in the environmental and technical fields and development research

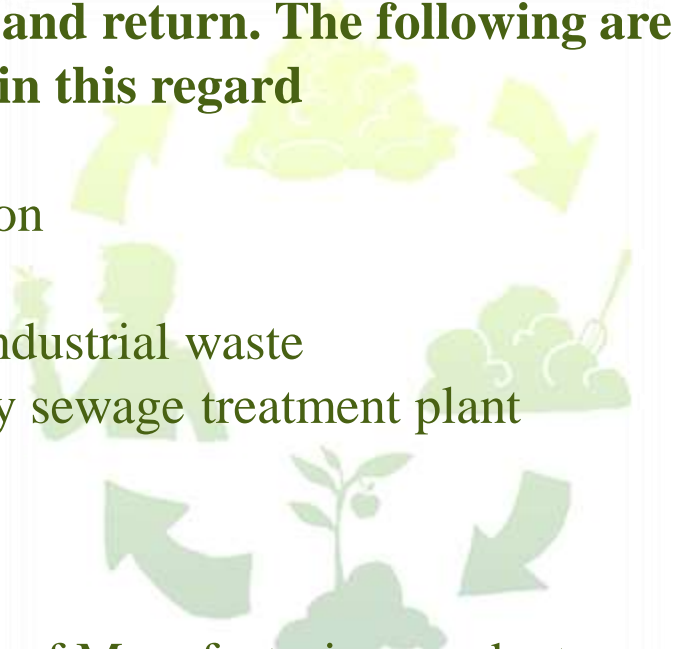
expansionIn cultivating green areas that approved by the general plan of the companyto reduce carbon levels

Availability of necessary self-monitoring devices for environmental measurements

Use the Green bonds System for Trade with the other companies that have the most carbon emission

□ THE OPTIMUM USE OF RESOURCES

The company seeks to make optimal use of all sources of energy, water, and materials as a basic determinant of economic and environmental cost and return. The following are the most important projects in this regard

- 
- 1- Electric power station
 - 2- solar power plant
 - 3- the incinerator of industrial waste
 - 4- Industrial & sanitary sewage treatment plant
 - 5- boilers station
 - 6- naturalized factory
 - 7- The E.S.S factory
 - 8- Aggregation Station of Manufacturing products

1- THE ELECTRIC POWER STATION

- The company owns two stations of electric energy with a capacity of 34 mg/watt/hour, as it uses natural gas fuels with optimum utilization of heat emissions (Exhaust) to produce chilled water used for conditioning five production units in an effort to reduce energy waste and greenhouse gas emissions.



2- SOLAR POWER PLANT:

The volume of renewable energy within the company (1 megawatt hour) was built on top of the workshop complex in 2016, and it is planned to increase the expected capacity to produce electricity from renewable energy (12 megawatt hour) when exploiting the areas of rooftops of administrative buildings, primary and auxiliary units, and the expected increase in renewable energy production During 2022 to 2027, it will reach (12 megawatts per hour) at a rate of 33% of the current energy use.



3- THE INCINERATOR

IN 2012, A SOLID WASTE INCINERATOR WAS ESTABLISHED AFTER OBTAINING ENVIRONMENTAL APPROVAL FOR ITS CONSTRUCTION WITH A CAPACITY OF (1 TON/HOUR) ATTACHED TO IT A STEAM GENERATION BOILER WITH A THERMAL ENERGY UTILIZATION SYSTEM TO PRODUCE CHILLED WATER AT A TEMPERATURE OF (7°C) THROUGH SPECIAL CONDENSERS EQUIVALENT TO (2000 TONS). COOLING FOR THE CONDITIONING OF ONE PRODUCTION BUILDING, USING BURNING WASTE THAT CANNOT BE RECYCLED, WHICH HELPS IN STABILIZING THE WATER AND ENERGY BALANCE THE EXPECTED INCREASE IS THAT AN ENVIRONMENTAL APPROVAL HAS BEEN OBTAINED FOR THE CONSTRUCTION OF ANOTHER INCINERATOR WITH A CAPACITY OF (2 TONS / HOUR) TO PRODUCE THE EQUIVALENT OF (4000 TONS) OF COOLING TO BE USED IN THE CONDITIONING OF PRODUCTION UNITS WITH AN INCREASE OF 200% TO SUPPORT THE STABILITY OF THE WATER AND ENERGY BALANCE.



❑ 4- SEWAGE TREATMENT PLANT:

The company owns a sanitary and industrial sewage treatment plant, and it is one of the largest plants in the industrial city of the Sixth of October City, with a production capacity of (1220 m³ / day). To irrigate an area of 33,000 m² of non-fruitful plants and trees and expand the cultivation of green spaces to reduce water loss and benefit from it from the perspective of the circular economy.



□ 5- BOILERS STATION :

The company owns (4) boilers (steam boilers) with a production capacity for each boiler (16 tons / day) and one boiler with a capacity (4 tons / day), all of which operate on natural gas, and the resulting steam is used to humidify smoke, and there is an integrated steam recovery system to reduce From water loss, which helps to stabilize water and energy balance



6 -NATURALIZED PLANT-:

The company has established (2) naturalized factory to recycle fine smoke, using fine tobacco left over from the process of chopping tobacco, where it is mixed with binding materials to be re-manufactured as a tobacco leaf that is shredded to be included in the product mix at a ratio of 20:15%, which means reducing waste from fine Smoke 15-20% to apply the circular economy perspective.



7- FLUFFY ROOTS FACTORY (E.S.S):

The company owns a factory for recycling smoke roots, which was established in 2015 to blow up and cut the roots and add them by 10% to the product mix in order to achieve the circular economy strategy to reduce waste of waste (smoke rejected) and an economic return of 10% of these wastes



8- A STATION FOR COLLECTING MANUFACTURING OUTPUTS:

Environmental management of waste: The company pursues a good and tight system in this field to control all kinds of waste. The company has established a manufacturing output station to collect, sort and classify waste into:

- Solid waste: where the product of sorting works is used for the waste that cannot be sold as fuel for the incinerator, and the rest is sold by auction among the companies that obtained environmental approvals.
- Hazardous waste (solid - liquid) is to be disposed of safely by contracting with companies specialized in the field of hazardous waste disposal that have environmental approvals.



INTERNAL ENVIRONMENTAL MONITORING SYS.



INTERNAL ENVIRONMENTAL MONITORING SYS.

The company identifies, assesses and manages climate-related risks through the following procedures:

- 1- There is a sector in the company's administrative structure specialized in environmental and licensing affairs.
- 2- Existence of a monthly and annual plan implemented by trained and qualified technical cadres to measure emissions and determine their compliance with the permissible limits in accordance with the laws regulating this.



INTERNAL ENVIRONMENTAL MONITORING SYS.

3- The presence of measuring devices for the internal and external work environment, which are mobile environmental measuring devices to measure emissions, suspended, total and inhaled dust, devices for measuring thermal stress and noise, and devices for measuring emissions for chimneys. They are calibrated periodically in specialized centers and calibration is carried out according to the calibration plan.

4- The specialized, accredited and contracted center conducts periodic measurements of the sources of emissions in the industrial complex in the Sixth of October, which are “power plant chimneys - and boilers - incinerators”, noting that the energy used is natural gas and emissions are without the limits of the law.




(RISK MATRIX) RISK ANALYSIS

(RISK MATRIX) RISK ANALYSIS

The risks related to climate-affected emissions (power plant chimneys - boilers - incinerators) are determined through the analysis of the risk matrix to determine the extent of conformity with the standards of the environmental law, as follows: -

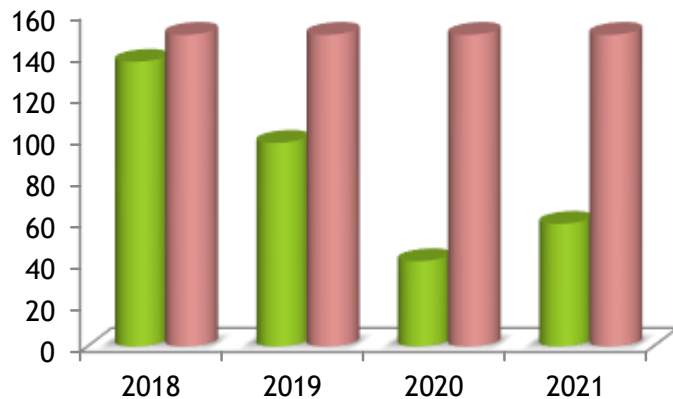
The severity of the danger and its frequency are reviewed through environmental measurements for each of the elements (carbon monoxide, co - nitrogen oxides, NOx, sulfur oxides, SOx).

In the event of a deviation from the norm of the law, initiatives are taken to correct and reconcile the situation.

low Risk		intensity				
Medium severity 		Not Found	weak	Average	Adult	very dangerous
high risk 		1	2	3	4	5
Repetition	little  1	1	2	3	4	5
	Improbable 2	2	4	6	8	10
	maybe 3	3	6	9	12	15
	mostly 4	4	8	12	16	20
	frequent 5	5	10	15	20	25

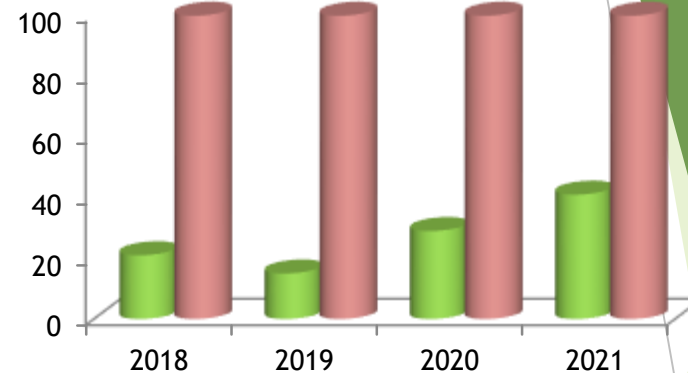
EMISSIONS MEASUREMENTS

EMISSIONS FROM THE INCINERATOR CHIMNEY OF (CO)CARBON MONOXIDE



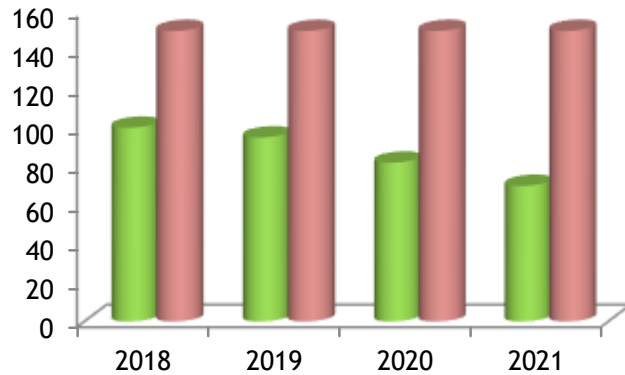
law standard Environment No. 4 of the year1994 and its amendments	Measure mg/m3	years
150	137	2018
150	98	2019
150	41	2020
150	59	2021

EMISSIONS FROM THE CHIMNEY OF THE BOILER PLANT OF (CO)CARBON MONOXIDE



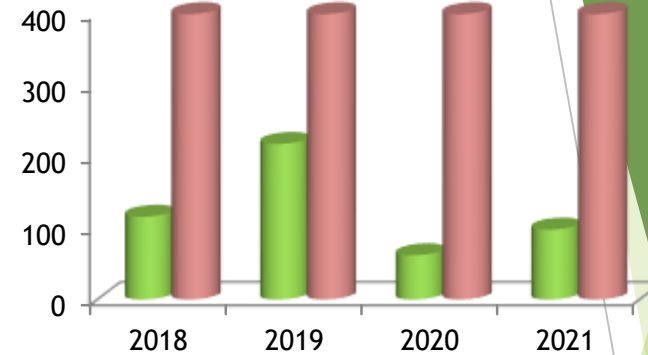
law standard Environment No. 4 of the year1994 and its amendments	Measure mg/m3	years
100	21	2018
100	15	2019
100	29	2020
100	41	2021

□ EMISSIONS FROM THE POWER PLANT CHIMNEY OF
 (CO)CARBON MONOXIDE



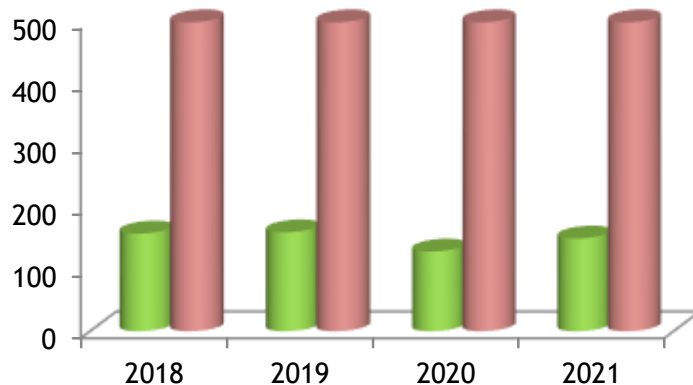
law standard Environment No. 4 of the year1994 and its amendments	Measure mg/m3	years
150	100	2018
150	95	2019
150	82	2020
150	70	2021

□ EMISSIONS FROM THE CHIMNEY OF THE
 INCINERATOR OF OXIDES NITROGENOUS(NOx)



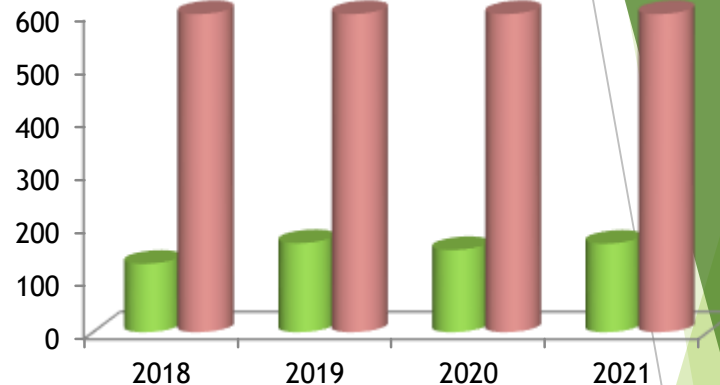
law standard Environment No. 4 of the year1994 and its amendments	Measure mg/m3	years
400	116	2018
400	218	2019
400	62	2020
400	98	2021

EMISSIONS FROM THE CHIMNEY OF THE BOILER PLANT OF NITROGEN OXIDES (NOx)



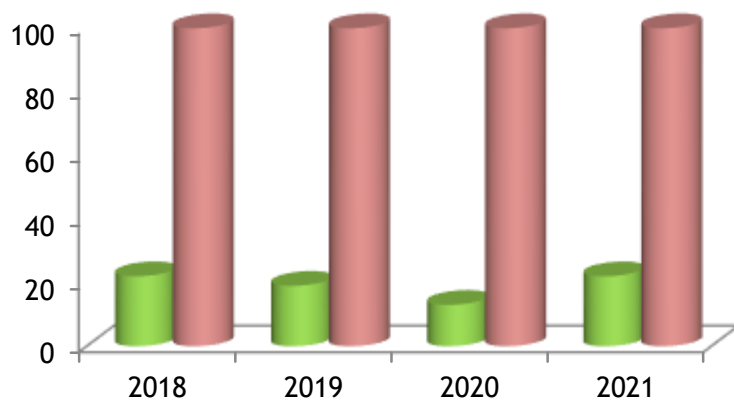
law standard Environment No. 4 of the year1994 and its amendments	Measure mg/m3	years
500	158	2018
500	160	2019
500	129	2020
500	150	2021

EMISSIONS FROM POWER PLANT CHIMNEY OF NITROGEN OXIDES (NOx)



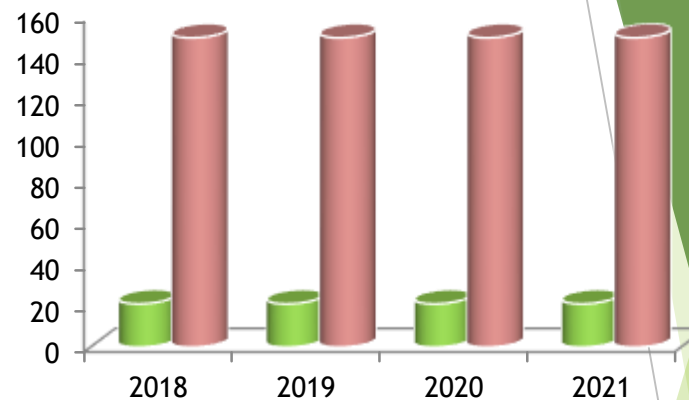
law standard Environment No. 4 of the year1994 and its amendments	Measure mg/m3	years
600	129	2018
600	168	2019
600	155	2020
600	167	2021

EMISSIONS FROM THE CHIMNEY OF THE INCINERATOR OF SULFUR OXIDES (SO_x)



law standard Environment No. 4 of the year 1994 and its amendments	Measure mg/m ³	years
100	22	2018
100	19	2019
100	13	2020
100	22	2021

EMISSIONS FROM THE CHIMNEY OF THE BOILER PLANT (SO_x) SULFUR OXIDES

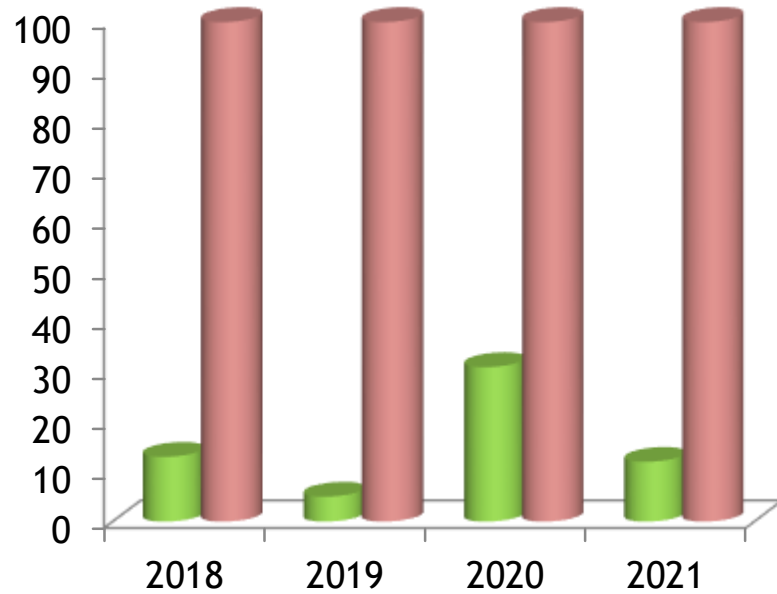


law standard Environment No. 4 of the year 1994 and its amendments	Measure mg/m ³	years
150	21	2018
150	21	2019
150	21	2020
150	21	2021



EMISSIONS FROM POWER PLANT CHIMNEY

(SO_x)



law standard Environment No. 4 of the year 1994 and its amendments	measuremen tmg/m3	the years
100	13	2018
100	5	2019
100	31	2020
100	12	2021