



# 2022

## Sustainability Report

2021 performance

# About this report

## Scope

This annual sustainability report outlines EDA Industries S.p.A. (EDA) sustainability strategy, programs and performance during the calendar year 2021. It is aimed at stakeholders who want to learn more about our commitment and approach to sustainability. Unless otherwise stated, the information and data cover all our activities performed in EDA Italy headquarter: Cittaducale (RI), Italy site.

## Report structure

The report focuses on the three material topics (see page 6) of our sustainability strategy, that are aligned with our business priorities. We identified these topics considering EDA sustainability context and stakeholders' concerns. For each material topic, we defined goals and programs. We also include examples of actions we have carried out, or planned, at EDA Italy site in order to improve positive results or reduce negative impacts.

## Use of symbols

We use the following symbols in this report to indicate our progress towards our objectives:

✓ Target achieved     In progress     No progress/not achieved

## Availability

This sustainability report is available in PDF format at <https://www.eda-industries.net/en/about-us//companyreports.html>

## Feedback

We value feedback and encourage contributions and suggestions from all our stakeholders. You can email us at [info@eda.industries.com](mailto:info@eda.industries.com)

This report represents a balanced and reasonable presentation of our organization's economic, environmental and social performance.

Rabah Derradji  
Managing Director



# Content

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1. EDA Group – Companies general data .....	4
2. EDA Group Market place .....	4
3. EDA Group Core Business: products and solutions .....	5
4. EDA main material topics: People first, Sustainable Business, Environment protection.....	6
<b>5. Innovation</b> .....	<b>7</b>
5.1 EDA Terni R&D Center .....	7
5.2 SocrATE: the WLBI solution .....	7
<b>6. People first</b> .....	<b>8</b>
6.1 Labor & Human Rights.....	8
6.1.1 Training on corporate social responsibility .....	8
6.1.2 Test of Employees’ satisfaction .....	8
6.1.3 Labor procedures.....	9
6.2 Ethics & Inclusion.....	10
6.2.1 Code of Conduct .....	10
6.2.2 Abuse of office, corruption and extortion.....	10
6.2.3 Reporting of irregularities .....	11
6.2.4 Ethics Committee .....	11
6.3 Health & Safety.....	12
6.3.1 Health and Safety specific training and participation .....	13
6.3.2 Visibility of emergency teams .....	13
6.3.3 Pest control program.....	13
6.3.4 Near-misses tracking .....	13
<b>7. Environment Protection</b> .....	<b>15</b>
7.1 Hazardous Substances .....	15
7.2 Wastes .....	15
7.3 Air Emissions.....	16
7.4 Water .....	16
7.5 Energy and GHG emissions.....	17

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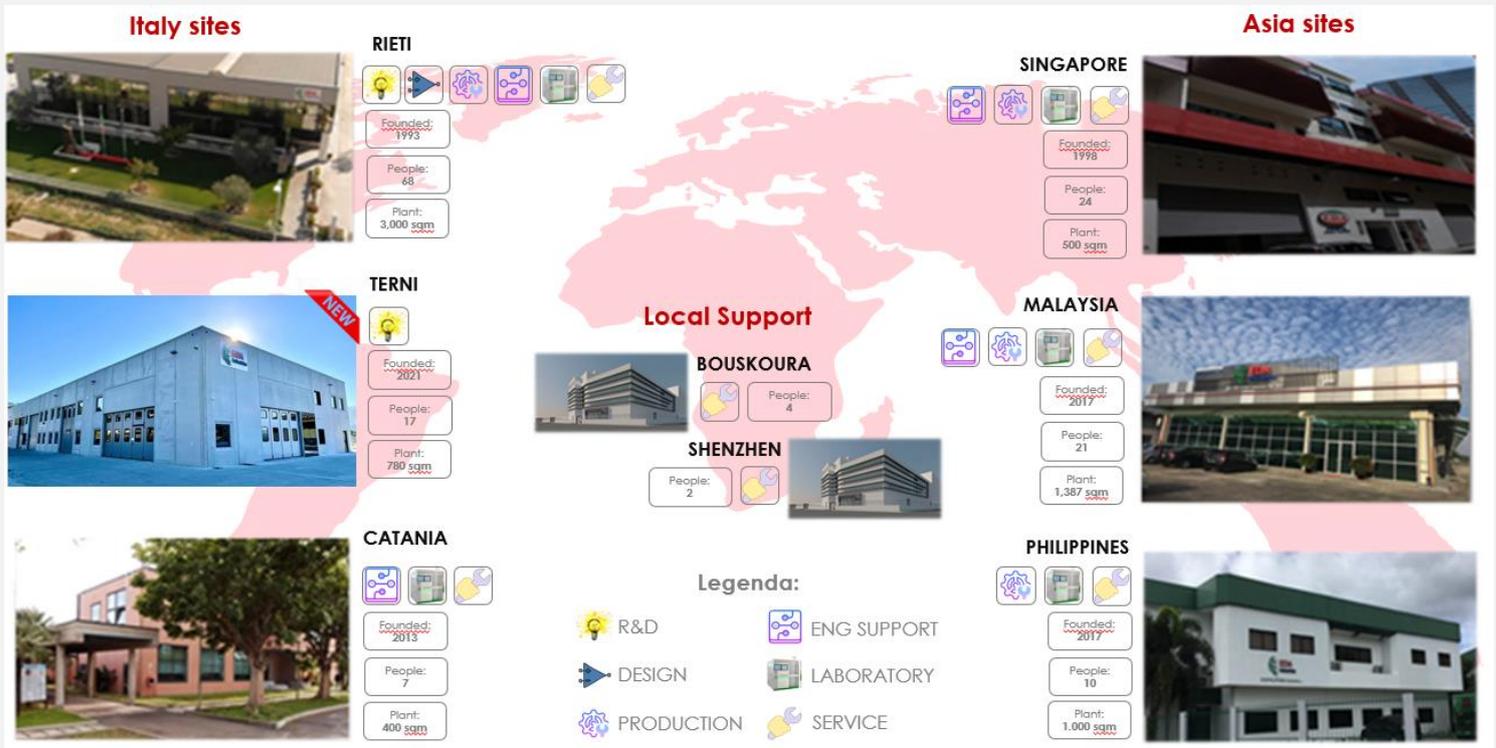
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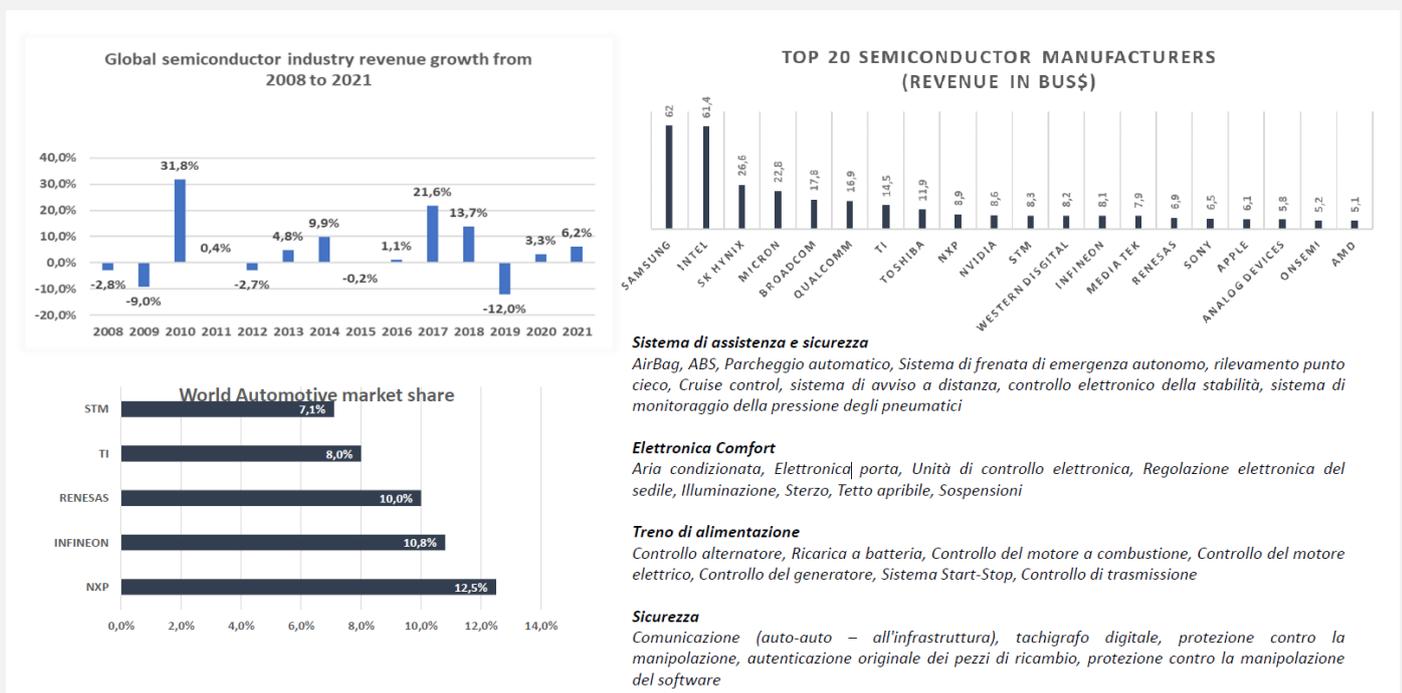
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# 1. EDA Group – Companies general data



# 2. EDA Group Market place



### 3. EDA Group Core Business: products and solutions



**from the FRONT END...**

## SocrATE

Automated WLBt & Test - 5 stages  
HV MOSBTS Tester  
Software  
Probe Card

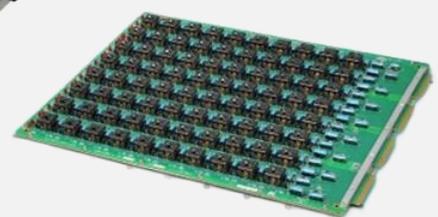
This block features a background image of a silicon wafer. It displays four key components of the SocrATE system: a large industrial machine for automated WLBt & Test, a smaller HV MOSBTS Tester, a software interface showing a green test pattern, and a circular probe card.

**...to the BACK END**

## ETNA

Burn-in Chambers  
Software  
Test Platforms  
Burn-in Boards

This block features a background image of a chip. It displays four key components of the ETNA system: a large industrial Burn-in Chamber, a software interface with graphs, a Test Platform (a green PCB with components), and a Burn-in Board (a green PCB with many components).



## 4. EDA main material topics: People first, Sustainable Business, Environment protection

EDA identified three main material topics considering EDA sustainability context and stakeholder concerns or expectations:

- **People first (Health & Safety, Labor & Human Rights, Ethics & Inclusion)**
- **Sustainable business (Quality, Innovation)**
- **Environment Protection (Hazardous Substances, Wastes, Air Emissions, Water, Energy)**

STAKEHOLDERS	KEY EXPECTATIONS
EMPLOYEES	<ul style="list-style-type: none"> <li>• Health &amp; Safety</li> <li>• Labor &amp; Human Rights</li> <li>• Ethics &amp; Inclusion</li> </ul>
CUSTOMERS	<ul style="list-style-type: none"> <li>• Quality</li> <li>• Innovation</li> <li>• Ethics &amp; Inclusion</li> </ul>
SUPPLIERS	<ul style="list-style-type: none"> <li>• Ethics &amp; Inclusion</li> <li>• Health &amp; Safety</li> <li>• Labor &amp; Human Rights</li> </ul>
INVESTORS AND BANKS	<ul style="list-style-type: none"> <li>• Quality</li> <li>• Innovation</li> <li>• Health &amp; Safety</li> </ul>
LOCAL PARTNERS	<ul style="list-style-type: none"> <li>• Ethics &amp; Inclusion</li> <li>• Health &amp; Safety</li> <li>• Labor &amp; Human Rights</li> </ul>
NATIONAL AND LOCAL AUTHORITIES	<ul style="list-style-type: none"> <li>• Quality</li> <li>• Ethics &amp; Inclusion</li> <li>• Health &amp; Safety</li> <li>• Wastes</li> <li>• Air Emissions</li> <li>• Hazardous Substances</li> </ul>
UNIVERSITIES	<ul style="list-style-type: none"> <li>• Labor &amp; Human Rights</li> <li>• Ethics &amp; Inclusion</li> <li>• Innovation</li> </ul>
INDUSTRY ASSOCIATIONS	<ul style="list-style-type: none"> <li>• Labor &amp; Human Rights</li> <li>• Ethics &amp; Inclusion</li> <li>• Innovation</li> </ul>
MEDIA	<ul style="list-style-type: none"> <li>• Labor &amp; Human Rights</li> <li>• Ethics &amp; Inclusion</li> <li>• Innovation</li> <li>• Wastes</li> <li>• Air Emissions</li> <li>• Hazardous Substances</li> </ul>
LOCAL COMMUNITY	<ul style="list-style-type: none"> <li>• Labor &amp; Human Rights</li> <li>• Ethics &amp; Inclusion</li> <li>• Wastes</li> <li>• Air Emissions</li> <li>• Hazardous Substances</li> </ul>

For year 2022, EDA established to concentrate on: **Innovation, Labor & Human Rights, Ethics & Inclusion, Health & Safety** and **Environment Protection**.

## 5. Innovation

### 5.1 EDA Terni R&D Center

In November 2021, we inaugurated the new **EDA Terni R&D Center**. As a site for this location, we chose the strategically convenient area of Terni, due to its proximity and excellent connections with the Universities of Rome, Perugia and L'Aquila. In EDA Terni R&D center we carry out a series of activities for the development of new high-tech products, such as the Wafer Level Burn-In, specially designed for the front-end segment of the semiconductor production.



**STATUS:** ✓ **Achieved**

### 5.2 SocrATE: the WLBI solution

By interpreting SiC and GaN megatrend, **EDA** designed **SocrATE** project, putting in place all the skills to develop an exclusive product, in line with the expectations of the AUTOMOTIVE market such as Testing Coverage, Quality and lowest Test cost.



**SocrATE** is a complete Burn-in test system designed specifically to meet the needs of cost-sensitive volume manufacturing of current and next generation SiC, GaN and High Voltage devices.

**SocrATE** offers true site-independent test across a broad range of software-controlled configurations. The innovative architecture backs each of the system's 1800 or 3600 sites with a fully independent Test system.

**STATUS:** ✓ **Achieved**

## 6. People first

### 6.1 Labor & Human Rights

In compliance with our Code of Conduct, adopted since 2020, we established standards to ensure that working conditions in our organization are safe, that workers are treated with respect and dignity, and that business operations are environmentally responsible and conducted ethically.

We are improving **Labor and Human Rights** aspects by covering nine core principles:

- Freely chosen employment
- Prevention of underage labor and protection of young workers
- Fair organization of working time
- Fair wages and benefits
- Fair treatment and anti-harassment
- Non-discrimination
- Freedom of association
- Fair working conditions
- Employee well-being and privacy of personal information

#### 6.1.1 Training on corporate social responsibility

During 2021 we deepened the training of employees concerning corporate social responsibility:

Training Area	N° of training hours in 2021
Labor	6
Ethics	6
Health & Safety	172 (*)
Environment	9

<b>Total n° of training hours</b>	193
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(\*) Including legally requested Health and Safety training



**STATUS:**  **Achieved**

#### 6.1.2 Test of Employees' satisfaction

As part of a yearly program, in the early months of 2022 we performed a test of employees' satisfaction, by means of an internal anonymous questionnaire regarding the main principles of our Code of Conduct. Following these, we are identifying activities for the **improvement of the general level of employees' satisfaction**.

- Employees' Satisfaction Test Participation index: **94.4%**

**STATUS:**  **In progress**

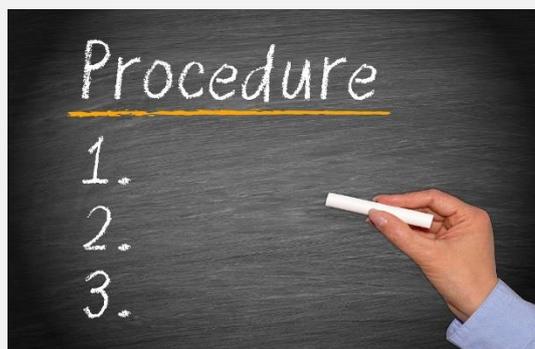
**Expected completion date:**  
**December 2022**



### 6.1.3 Labor procedures

During 2021 we introduced in EDA's management System procedures in order to regularize and standardize:

- Staff recruitment
- Working hours
- Student working conditions and allowances
- Freely chosen employment



STATUS:  Achieved

## PEOPLE INDICATORS

	2020	2021
Absenteeism (% of hours)	0.95%	0.96%

	2020	2021
Total unused holidays per capita (days)	9.75	6.76

Direct Workforce details 2021:	Number	Percentage
<b>Average Direct Workforce</b>	<b>83.58</b>	<b>100%</b>
Male	73.08	87%
Female	10.50	13%
<b>Full time</b>	<b>82.33</b>	<b>99%</b>
Male	73.08	89%
Female	9.25	11%
<b>Part time</b>	<b>1.25</b>	<b>1%</b>
Male	0.00	0%
Female	1.25	100%
<b>Permanent Contract</b>	<b>77.41</b>	<b>93%</b>
Male	67.00	87%
Female	10.41	13%
<b>Temporary contract</b>	<b>6.17</b>	<b>7%</b>
Male	6.08	99%
Female	0.08	1%

Indirect Workforce details 2021:	Number	Percentage
<b>Average Indirect Workforce</b>	<b>2.83</b>	<b>%</b>
Male	2.83	100%
Full time	2.83	100%

## 6.2 Ethics & Inclusion

In compliance with our Code of Conduct, concerning **Ethics and Inclusion** aspects we established to focus on the following:

- Principles of the Company Code of Conduct
- Abuse of office, corruption and extortion
- Reporting of Irregularities
- Ethics Committee

### 6.2.1 Code of Conduct

EDA Code of Conduct and Company Directives establish practical guidelines on the way activities are conducted and decisions are made, helping to promote a culture of integrity. EDA Code of Conduct also defines the guiding principles for all Stakeholders. It is based on the Responsible Business Alliance (RBA) Code of Conduct, sharing the same principles and values.



**Integrity:** EDA conducts its business with the highest ethical standards, honors commitments with loyalty and fairness by defending what it deems right.

**People:** EDA behaves with openness and trust, believes to be able to share knowledge, to encourage the contribution of all, to develop the potential of people through empowerment, teamwork and training. Each participant of EDA is personally involved in the continuous improvement process.

**Excellence:** EDA aims at quality and customer satisfaction and creates value for all partners, encourages innovation, develops skills, seeks accountability and acts with discipline, basing decisions on facts and priorities.

EDA Code of Conduct is available in Italian and English on our website (<https://www.eda-industries.net/en/about-us/codeofconduct.html>)

- In 2021 EDA updated its Code of Conduct in accordance with RBA Code of Conduct latest version (7.0)

**STATUS:** ✓ **Achieved**

### 6.2.2 Abuse of office, corruption and extortion

EDA has a zero-tolerance approach to concussion and corruption, regardless of the identity or position of the perpetrator or recipient of any bribe. It is also strictly prohibited for anyone to use Company funds or resources to make a political contribution.

The Code of Ethics and the Anti-Corruption Policy provide definitions regarding concussion and corruption and include details of the Company's rules for interacting with third parties. They also explain how to report actual or suspected violations and outline the potential disciplinary and legal consequences of any non-compliance.



**STATUS:** ✓ **Achieved**

### 6.2.3 Reporting of irregularities

EDA encourages everyone, including external business partners, to express, in good faith, any concerns they may have regarding possible violations of the Code of Ethics, company policies or the law. Managers are responsible for maintaining a working climate in which employees feel comfortable with speaking and expressing their ideas freely.

The misconduct reporting process is communicated to all employees. EDA applies the highest standards of confidentiality in the management of all reports received, through the Ethics Committee for Social Responsibilities.

EDA ensures that no employee who reports a concern in good faith suffers retaliation in the form of harassment, or adverse employment or career consequences.



**STATUS:** ✓ **Achieved**

### 6.2.4 Ethics Committee

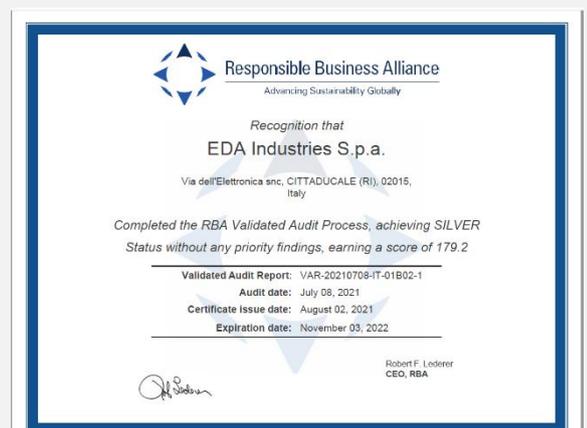
EDA Ethics Committee has the task of supporting the company in the management and promotion of social responsibilities in all functions and offices. The Committee was established in 2020 and meets on a monthly basis. The Committee is made up of the corporate managers of Health and Safety, Labor and Human Rights, Environment, Ethics and Compliance, appointed by the company management for a two-year period. The Committee is chaired by a coordinator with the task of maintaining the evidence of the meetings and acting as a link between its members.

The role and responsibilities of the committee include:

- Evaluate the principles of the Code of Ethics and policies in relation to the culture and commitment of the company
- Review reports, violations and investigate them. Propose the measures deemed appropriate
- Call staff to acquire information
- Carry out internal compliance audits
- Propose to the company management the adoption of measures for the adaptation of the Management System
- At the request of the Management, express an advisory opinion on issues that may affect the company
- Examine the communication and training program
- Report the status of activities annually

- On July 2021 **EDA reached the important goal of joining RBA Participants**, by completing the RBA Validated Audit Process, and by achieving **SILVER** Status without any priority findings, earning a score of **179.2**

**STATUS:** ✓ **Achieved**



## ETHICS INDICATORS

	2020	2021
<b>Employees' reported ordinary concerns</b>	Not Available	5
Employees' reported ordinary concerns closed at year end	Not Available	5

	2020	2021
<b>Misconduct incidents</b>	Not Available	0

<b>Details of 2021 misconduct incidents</b>	
Total number of incidents under review as of January 01	0
Total number of incidents reported or identified during the year	0
Actual misconduct cases identified through audit or management review	0
Incidents closed by a formal survey report:	0
N° of confirmed external misconduct cases	0
N° of confirmed internal misconduct cases	0
Incidents closed after preliminary assessment	0
Incidents still open at year end	0
Number of public legal cases regarding corruption brought against EDA or its employees	0

## 6.3 Health & Safety

Since the very beginning of its establishment, EDA adopted the best practices in the **Health and Safety** area, assuring the respect of applicable laws and Regulations.

During year 2021, in order to assure the maintaining of the safest possible working conditions, we took actions towards

- Health and Safety specific training and participation
- Visibility of Emergency teams
- Pest control program

### 6.3.1 Health and Safety specific training and participation

EDA implemented training and participation programs on specific Health and Safety topics such as safety concern notification.

**STATUS:** ✓ **Achieved**



### 6.3.2 Visibility of emergency teams

EDA has introduced differently colored identification bands in order to visualize more clearly the specific emergency teams.

**STATUS:** ✓ **Achieved**



### 6.3.3 Pest control program

In order to ensure maximum healthiness of the workplace and preserve the value of Company assets, EDA has updated Health and Safety procedures by introducing pest control on a regular basis.

**STATUS:** ✓ **Achieved**



### 6.3.4 Near-misses tracking

Following the principle that *'a near miss not reported could be the next accident'*, following a top-down approach we are promoting actions to sensitize all employees to a better tracking of near misses.

**STATUS:** 🔄 **In progress**

**Expected completion date:**  
**December 2022**



## SAFETY INDICATORS

	2020	2021
<b>Completion of Safety training program (% hours) (1)</b>	100%	78%

(1) Not completed due to COVID-19: remaining safety training hours re-scheduled for 2022

	2020	2021
<b>Number of Injuries</b>	1	0
<b>Injuries frequency per working hour (pmh)</b>	7.8	0
<b>Injuries severity: total of injuries-related wasted hours per working hour (pmh)</b>	437.5	0
<b>Mean injury duration (hours)</b>	56	0

	2020	2021
<b>Near miss frequency per working hour (pmh)</b>	0	0

## 7. Environment Protection

EDA established to concentrate on the **Environment protection** material topic by considering 5 sub-topics:

### **Hazardous Substances, Wastes, Air Emissions, Water and Energy – GHG emissions**

For all of them, during year 2021 environmental programs have been developed, by detailing performance indicators and goals to achieve, and were completed.

#### **7.1 Hazardous Substances**

##### **Lowering GWP of admitted refrigerant gases**

Though Regulation (EU) No 517/2014 doesn't limit the use of refrigerant gases for applications below -50°C, EDA is **substituting admitted refrigerants** for such applications **with others with a much lower Global Warming Potential (GWP)**.

For applications below -50°C, during 2021 EDA evaluated the substitution of admitted refrigerant gas R404A with lower GWP refrigerant gas R452, technically validated such solution and proposed it to its customers as a lower impact alternative.

**STATUS:**  **Achieved**

Other lower GWP alternatives are under evaluation for R23 and R508B refrigerant gases.



#### **7.2 Wastes**

##### **Reducing CNC mechanical processing wastes**

We started a dedicated **environmental program**, aiming at recovering lubricant out of the draining of CNC mechanical process lubricated wastes (scraps and shavings), to be reused in CNC machines.

- **During 2021 we recovered 384 liters of lubricant that were re-used in CNC machines**

In parallel, the amounts of CNC mechanical process wastes were lowered by 384 liters, **producing 'purer' wastes** (mainly metal shavings), because they were almost deprived of lubricant's contamination.



**STATUS:**  **Achieved**

## 7.3 Air Emissions

### Reducing impact of TIG / MIG soldering process air emissions

In order to improve the quality of TIG / MIG soldering process emissions, EDA reduced the upstream production process of soldered input materials, moving toward a cleaner outsourced LASER process rather than a CNC process that leads to emulsion impregnated input materials.



- **During 2021 we contained the TIG / MIG soldering of CNC processed (therefore emulsion impregnated) input materials, below 12%, thus generating purer air emissions.**

**STATUS:**  **Achieved**

## 7.4 Water

### Reducing water withdrawal and wastewater

EDA production processes do not involve water withdrawal or wastewater. In order to reduce domestic water consumption and wastewater EDA involved its personnel in an awareness campaign for a sustainable use of water and started a water reduction program.

- **During 2021 we reduced water consumption and wastewater by 0.8%**

**STATUS:**  **partially achieved: (target reduction level was 2%)**



## 7.5 Energy and GHG emissions

### Energy saving in electronic boards' frames production process

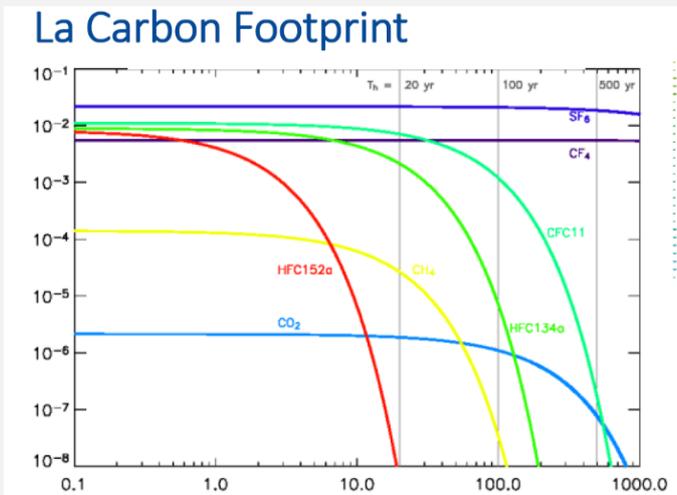
During 2021 EDA procured and installed a dedicated equipment for inserting the grafts in the electronic boards' frames. The new equipment is much less energy consuming and faster than the equipment previously in use.

- During 2021 we reduced the energy consumption for this process by 132kWh per day, out of total 144kWh (-91.66%)

STATUS:  Achieved

### Lowering GHG emissions

To continuously monitor and reduce its **Carbon Footprint**, EDA chose to use one of the best internationally recognized dedicated software instrument: a powerful database called **Bilan Carbon**.



Radiative forcing over time of a ton of gas emitted at the moment 0

(horizontal axis: in years – logarithmic scale; vertical axis: radiative forcing in  $W / m^2$  – Logarithmic scale)

- During 2021 we consolidated the use of the Bilan Carbon database and repeated EDA Carbon Footprint calculation, which resulted in 266 Tco2E

STATUS:  Achieved

## Moving towards more renewable energy sources

In order to lower our indirect emissions (scope 2 of the GHG protocol) during 2021 we started an important environmental program aiming at self-producing energy, throughout the installation of photovoltaic panels on the facility roof.



We are installing a photovoltaic system with the following characteristics:

Photovoltaic system characteristics	
<b>Total Power [kWp]</b>	185
<b>Produced Electronic Energy [kWh/year]</b>	225,330
<b>Self-consumption index [%]</b>	90 %
<b>Self-consumed Energy [kWh/year]</b>	202,797
<b>Self-consumed Energy by Photovoltaic / Total consumption</b>	33 %

**STATUS:**  In progress. Expected completion date: June 2022

## ENVIRONMENT INDICATORS

Waste in tons	2020	2021
<b>Total waste</b>	31.33	42.81
<b>Total hazardous waste (1), (2)</b>	0.60	2.21
<b>Non-hazardous waste (%)</b>	98.08%	94.83%

(1) In 2021 we increased the internal processing of vetronite (make), compared with the out-sourced (buy), generating more vetronite sludges (hazardous waste); furthermore the number of produced systems increased by about 24%

(2) In 2021 we increased the frequency of CNC machines' tanks washing (quarterly instead of yearly), thus producing more emulsion (hazardous waste)

Waste split	2020	2021
<b>Sent for recovery (tons) (3)</b>	29.91	40.01
<b>Sent for recovery (%)</b>	95,46%	93,45%
<b>Other treatments (tons) (4)</b>	1.41	2.80
<b>Other treatments (%)</b>	4,53%	6,54%

(3) Reuse, or regeneration, or recycle, or waste burnt with recovery of energy (combustion)

(4) physical-chemical treatment, or other treatments (e.g. landfill or incineration or biological treatment)

Air emissions	2020	2021
<b>Welding area suction system working hours per produced Systems (hrs)</b>	28.52	26.8

Water Consumption	2020	2021
<b>Domestic Water consumed per employee (mc) (5)</b>	39.57	44.1

(5) No water withdrawal or wastewater involved for EDA processes. During 2020, domestic water consumption was lower due to agile work caused by COVID-19; December 2021 data not yet available

Electricity Consumption	2020	2021
<b>Electricity consumed (kWh)</b>	537,087	586,578
<b>Electricity consumed related to revenue (kWh / K euro) (6)</b>	36.46	27.52

(6) In the first months of 2021 we invoiced several products (Systems) actually produced in the last part of 2020

Carbon Footprint	2020	2021
<b>EDA Carbon Footprint (Tco2E) (7)</b>	237	266
<b>EDA Carbon Footprint related to revenue (Tco2E / M euro)</b>	16.12	12.48

(7) Calculation includes direct Greenhouse Gas (GHG) emissions from mobile combustion sources (EDA business travels) and indirect emissions from our energy consumption, reported in Tons of co2 Equivalent.

# Sustainable innovation



For more information on EDA products and solutions, visit <https://www.eda-industries.net/en/>

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