

— Recycle —



Loop project - National research
INTERVIEWS: Entry # 54



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ENGINEER



Industrial engineer (cc), https://commons.wikimedia.org/wiki/File:Industrial_Engineer_Working.jpg

After finishing his studies

at a scientific high school, having passed the exam with the highest marks, he moved to Milan to continue his studies at the Unipo university in the engineering sector. He graduated in 2019 and, thanks to the skills acquired over the years of study, he was hired by a private individual.

WHAT recycling activities do you undertake on a regular basis?

For waste recycling we mean: the set of strategies and methodologies aimed at recovering useful materials from waste in order, to reuse them.

The recycled material therefore prevents the waste of potentially useful materials, guarantees greater sustainability to the production / use cycle of materials, reduces the consumption of raw materials, the use of energy and the emission of associated greenhouse gases. Recycling does not replace the landfill and the incinerator, but it reduces their use, with great advantage for the environment and for economic sustainability.



Recycling, <https://www.green-news.it/taxonomy/term/118>

The recycling system involves the entire production process and not just the final stage. In fact, a product must be designed with a view to recycling using biodegradable materials.

Recyclable materials include all waste that can be reused to produce new objects equal to waste (glass, paper) or used to produce new materials (wood, fabrics). My business consists in designing homes and products capable of eliminating the negative impact on the environment; using highly renewable and recyclable raw materials with low environmental impact.



Collection and recycling of metals, pixabay licence, <https://pixabay.com/it/images/search/riutilizzo/>

I therefore manufacture products on the basis of sustainable design, thereby reducing the waste produced by their use.

This principle does not apply only in the initial phase of the design cycle but rather throughout its existence, up to disposal.

The idea was born from the need to help reduce waste that caused pollution. my business is associated with the zero waste movement and is responsible for raising awareness among the population to make conscious purchases and to undertake a lifestyle that goes in the direction of lowering waste and even reducing it to zero.

Zero waste favors the so-called reuse in which products that have reached the end of their life are used for other purposes. The purchase of any asset is preceded by a study of materials, construction processes and company policies. my company excludes the use of plastic, which in just over a century has made its way thanks to its versatility and profitability. Suffice it to say that its production has increased twenty times. Yet, alongside clear advantages, today's plastic system has serious drawbacks.



Plastic recycling, pixabay licence, <https://pixabay.com/it/images/search/buste%20di%20plastica/>

According to estimates by the World Economic Forum, currently only 14% of plastic packaging is recycled. The rest is incinerated, thrown into landfills or, even worse, ends up in the sea. Increasing the amount of recycled materials is the first step to take. The choice of materials, colors, sizes and other design-related factors determines the ease or otherwise with which plastic packaging can be recycled. The biggest challenge is represented by the huge amount of plastic used for packaging that need to be re-organized, and the replacement of plastic bags with biodegradable or reusable ones.



HOW DID YOU INTEGRATE

knowledge or technological processes to encourage a better circularity of your work?



Circular economy (cc), <https://pixabay.com/de/vectors/erde-globus-%c3%b6kologie-nat%c3%bcrlich-159131/>

The main techniques I am aware of are the following: creative skills, useful for drawing and designing complex pieces; strong mechanical and mathematical skills, acquired thanks to the Degree Course; organizational skills and ability to manage time and resources, thanks to the subjects studied during the three years of study such as physics, mathematics, science and technology of machines, systems for energy and the environment, the latter subject I allowed to have knowledge about it;

1. renewable sources: overview of the different renewable energy sources and their state of use in Italy. Incentive mechanisms for plants from renewable sources.
2. hydroelectric power plants: hydraulic energy and evaluation of its potential; types of systems (flowing water, basin, reservoir and pumping); constituent elements of a hydroelectric plant; theoretical producible power and actual production; examples of national plants.
3. wind farms: wind energy and assessment of wind potential; producible power and effective production; types of wind turbines (vertical axis and horizontal axis); examples of wind farms.
4. bioenergy: types of plants; focus on biogas and biomethane plants; energy and management aspects; examples of national plants.
5. Hydrogen: production of hydrogen from renewable energy; the electrolysis process; types of electrolyzers; the storage of hydrogen; comparison between hydrogen and other fuels; energy and economic aspects.
6. Bio-methane: plants for the synthesis of bio-methane from renewable sources; comparison between hydrogen and bio-methane; hydrogen-methane blends and potential advantages; storage and transport; energy and economic aspects. Application examples.



Sustainable thinking, <https://pixabay.com/it/illustrations/uomo-testa-freccie-multitasking-6340117/>

7. Bio-methanol: plants for the synthesis of methanol from renewable sources; comparison between hydrogen and methanol; storage and transport; energy and economic aspects; application examples. the skills acquired during the course of study allowed me to carry out activities in companies operating in the plant and port sector, shipyards, fish farming companies and shipping companies.



Passing a state exam for the qualification to exercise the profession of engineer, through registration in the register of “Junior Engineers”, has allowed me to work as a freelance in the field of technical consultancy, in addition to the degree I he also prepared for a training course for the achievement of a Master’s Degree mainly in the field of Industrial Engineering. Compared to other areas of knowledge, engineering has a focus on solving problems useful for improving the life of people and society.



WHAT INNOVATIVE FUTURE

projects or objectives does it arise in relation to recycling and the potential that this has in its economic activity?

The climate emergency has drawn the attention of institutions to the need to encourage change, the acquisition of an ecological awareness by companies can be decisive in reversing the course of climate change.

The development of a Green Economy involves the implementation of business processes and models that aim to reduce the environmental impact, assuming a role of social responsibility. improving the lives of people and the environment with a vision of the future aimed at promoting virtuous behavior. The Goals have a universal character and are based on the integration between the three dimensions of sustainable development (environmental, social and economic). The initial part is the recognition of the unsustainability of the current development model.

INTERVIEWS: Entry # 54

My challenge is to contribute to the construction of sustainable communities, to provide services that can improve people's lives and the environment, with a vision of the future aimed at promoting virtuous behavior.

For this reason I conceive the collection of waste within the paradigm of the circular economy, in which nothing is wasted but everything is put back into circulation, to reduce waste and the consumption of raw materials. Through the cycle of separate collection of non-renewable natural resources.



Green world, https://www.adnkronos.com/green-economy-una-roadmap-al-2030-per-litalia_6VCXkMhjS24JT1IOD0oJhL

A careful and widespread separate collection is a first step towards building a sustainable economy. For some time I have been engaged in campaigns to promote conscious consumption and active practices to reduce waste. Another strategic element for sustainable growth, at the center of our activities, is urban greenery.



Climate change, https://www.loop-erasmus.eu/wp-content/uploads/gravity_forms/

The presence of greenery in our cities, the amount of spaces dedicated to it and the maintenance care of the same, are some of the main indices of civilization and livability. In addition to the management of existing greenery, it is even more important to know how to design it. To build a sustainable community it is important to share a vision of the future with the younger generations.

I think that the best way to spread sustainability issues does not go through a series of prohibitions and prescriptions, but rather to the construction of a common imagination.

We must work constantly to improve the quantity and quality of separate waste collection in the area in which we operate with a very clear objective: to avoid waste and dispersion, to recycle all collected waste so that it can come back to life as a new raw material.

Based on this mentality, I believe that the future of my eco-sustainable business is good and lasting.



Bins for separate waste collection (cc), <https://www.anteprima24.it/regione/rifiuti-campania-incremento-differenziata/>

RE CYCLE

QUESTIONNAIRE

1. What is the so-called “circular economy”?

| A | B | C |
|----|----|----|
| 50 | 30 | 20 |

2. Do you believe that a more sustainable economic system can be equally productive than the current one?

| A | B | C |
|----|----|----|
| 10 | 20 | 70 |

3. Which of these consumer choices have you decided to implement in the last 10 years to protect the environment?

| A | B | C |
|----|----|----|
| 80 | 10 | 10 |

4. How will the so-called “circular economy” affect the job market?

| A | B | C |
|----|----|---|
| 50 | 45 | 5 |

5. In your work, how many strategic choices related to sustainability have been made in the last 10 years?

| A | B | C |
|----|----|----|
| 60 | 20 | 20 |

6. Which of these 4 “Rs” is more important to ensure a better future for humanity?

| A | B | C | D |
|----|----|---|---|
| 40 | 40 | 5 | 5 |

7. Which of these 4 “Rs” is most present in your family’s daily life?

| A | B | C | D |
|----|----|----|----|
| 50 | 20 | 10 | 20 |

8. In your opinion, what link is there between technology and the “circular economy”?

| A | B | C |
|----|----|----|
| 55 | 15 | 30 |

9. Do you think we will be able to change the way we consume so as not to affect the environment and its limited resources?

| A | B | C |
|----|----|----|
| 30 | 30 | 40 |

10. Are you familiar with the UN 2030 Agenda or have you ever heard of SDGs?

| A | B | C |
|----|----|----|
| 40 | 40 | 20 |

QUESTIONNAIRE

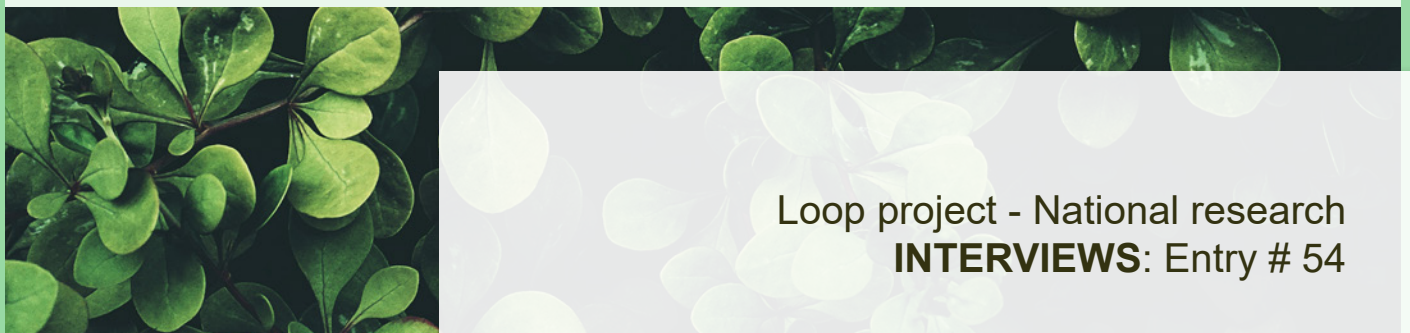
QUESTIONNAIRE

11. Do you think that the economy in the past was more sustainable than it is today?

| A | B | C |
|----|----|----|
| 10 | 10 | 80 |

12. Which of these 3 statements do you consider the most true and important?

| A | B | C |
|---|---|---|
| 5 | - | - |



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