eGreen

TEST YOUR DIGITAL ECO-RESPONSIBILITY!

Answer questions about your digital knowledge and habits.
Find out your eGreen profile and get advice on how you can improve!

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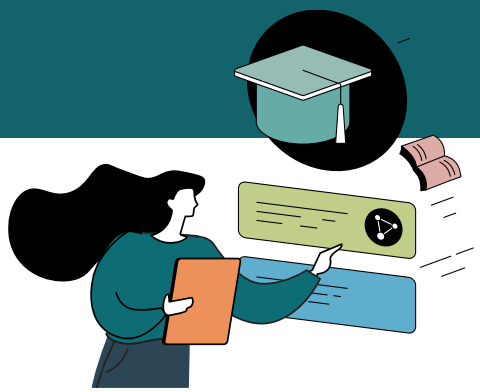

KNOWLEDGE

[email]

1. **How many emails are estimated to be sent and received daily?**
   - A. 105 million emails
   - B. ☐ 97 billion emails
   - C. ☐ 293 billion emails
   - D. ☐ 654 billion emails

2. **How much CO_2e (carbon dioxide equivalent) does a single email emit, compared with driving a car?**
   - A. ☐ 5 metres of driving
   - B. ☐ 12 metres of driving
   - C. ☐ 24 metres of driving
   - D. ☐ 33 metres of driving

[storage]

3. **What is a data centre?**
   - A. ☐ A place where physical documents are stored
   - B. ☐ A facility designed to house and manage computer systems and components including telecommunications and storage systems
   - C. ☐ A centre to organise business meetings and conferences
   - D. ☐ A location exclusively used for recreational purposes and gaming activities

4. **True ou False ? Data centres consume high amounts of energy because they need energy-intensive cooling systems to reduce the heat from servers.**
   - A. ☐ True
   - B. ☐ False

[streaming]

5. **True ou False ? Streaming a video is more impactful for the environment than having a video file downloaded online and stored on a hard drive.**
   - A. ☐ True
   - B. ☐ False

6. **What percentage of global internet data is attributed to video activities such as streaming and video conferencing?**
   - A. ☐ 25% of internet data worldwide
   - B. ☐ 50% of internet data worldwide
   - C. ☐ 70% of internet data worldwide
   - D. ☐ 80% of internet data worldwide

7. **Among the four categories below, which video stream category takes up the most data?**
   - A. ☐ Video on demand services (Netflix, Amazon Prime, HBO Max, etc)
   - B. ☐ Pornography
   - C. ☐ Streaming services (Youtube, Twitch, Youku, etc)
   - D. ☐ Other (videos hosted on social media, or hosted on dedicated websites)

8. **What percentage of the digital carbon footprint is attributed to on-demand video streaming platforms like Netflix and Amazon Prime?**
   - A. ☐ 2%
   - B. ☐ 4%
   - C. ☐ 7%
   - D. ☐ 10%

[socialmedia]

9. **How much time does an average person spend on social networks daily?**
   - A. ☐ 47 minutes
   - B. ☐ 1 hour and 32 minutes
   - C. ☐ 2 hours and 24 minutes
   - D. ☐ 4 hours and 17 minutes

10. **When using social media, which feature is the most data consuming and has the highest environmental impact?**
   - A. ☐ Images
   - B. ☐ Vidéo
   - C. ☐ Written text with emojis
   - D. ☐ Gifs

[devices]

11. **What is the most used digital device in the world?**
    - A. ☐ Smartphone
    - B. ☐ Tablet
    - C. ☐ Computer
    - D. ☐ Gaming console

12. **Which phase of the life cycle of a digital device has the most impact on the environment?**
    - A. ☐ Production
    - B. ☐ Transport
    - C. ☐ Usage
    - D. ☐ Disposal

13. **How much CO_2 equivalent is emitted during the production of a standard laptop computer?**
    - A. ☐ Equivalent to driving a car for 300 km
    - B. ☐ Equivalent to driving a car for 800 km
    - C. ☐ Equivalent to driving a car for 1,600 km
    - D. ☐ Equivalent to driving a car for 3,220 km

14. **How much electronic waste is effectively collected for recycling in the world?**
    - A. ☐ 9%
    - B. ☐ 17%
    - C. ☐ 44%
    - D. ☐ 61%

[security]

15. **Which of these practices is NOT recommended for cyber security?**
    - A. ☐ Protect your devices from virus
    - B. ☐ Avoid public or unknown wifi
    - C. ☐ Use a solid password for all of your accounts to be sure to remember it
    - D. ☐ Update security settings regularly

[apps]

16. **The yearly CO_2 emissions from an internet user's web browsing is equivalent to travelling how many kilometres by car?**
    - A. ☐ 500 km
    - B. ☐ 800 km
    - C. ☐ 1,400 km
    - D. ☐ 2,300 km

17. **In 2021, the contribution of the digital sector to global carbon emissions was equivalent to which global industry's emissions?**
    - A. ☐ Shipping industry
    - B. ☐ Civil airline industry
    - C. ☐ Automotive industry
    - D. ☐ Construction industry

HABITS

[email]

1. **How often do you clean your mailbox? (Advertisements, spam, old useless emails)?**
    - A. ☐ Everyday
    - B. ☐ Once a week
    - C. ☐ Once a month or less often
    - D. ☐ Never

2. **How many emails per week do you usually send on average?**
    - A. ☐ 0
    - B. ☐ 1-10
    - C. ☐ 10-30
    - D. ☐ More than 30

[storage]

3. **How often do you clean (move to removable hardware or delete) your digital storage (computer hard drive, GoogleDrive, Dropbox etc.)?**
   - A. ☐ Everyday
   - B. ☐ Once a week
   - C. ☐ Once a month or less often
   - D. ☐ Never

4. **Do you regularly check your computer for duplicate files?**
   - A. ☐ Yes, I consistently review for duplicates
   - B. ☐ Occasionally, but not systematically
   - C. ☐ Rarely, only when necessary
   - D. ☐ Never

[streaming]

5. **How much time per day do you spend watching videos on streaming platforms (Netflix, Youtube, TikTok, Instagram etc)?**
   - A. ☐ 0-1 hours per day
   - B. ☐ 1-3 hours per day
   - C. ☐ 3-5 hours per day
   - D. ☐ More than 5 hours per day

6. **How often do you use Mobile Data on your phone?**
   - A. ☐ Everyday
   - B. ☐ One or several times a week
   - C. ☐ Once a month or less often
   - D. ☐ Never

[socialmedia]

7. **On average, how often do you use your social media (Facebook, Instagram, TikTok…)?**
   - A. ☐ Every hour or less
   - B. ☐ Every 3 hours
   - C. ☐ Once a day
   - D. ☐ Never

8. **How often do you share content on social media?**

   A. ☐ At least once a day
   B. ☐ Once a week
   C. ☐ Once a month
   D. ☐ Never

[devices]

9. **How many digital devices do you own at home?**

   A. ☐ 0
   B. ☐ 1-3
   C. ☐ 3-6
   D. ☐ 6-9+

10. **When buying a new phone, do you purchase brand new or second-hand digital devices?**

   A. ☐ Yes, I solely buy second-hand options
   B. ☐ Occasionally, I consider buying second-hand devices when possible
   C. ☐ No, I prefer to buy brand new devices

11. **On average, how often do you buy a new phone?**

   A. ☐ Once every year or more frequently
   B. ☐ Every 1-2 years
   C. ☐ Every 2-3 years or less often
   D. ☐ Every 4 years or more

[security]

12. **How often do you clear your browser history and cookies?**

   A. ☐ Everyday
   B. ☐ Once a week
   C. ☐ Once a month or less often
   D. ☐ Never

[apps]

13. **When selecting and using digital apps or online platforms, how mindful are you of their environmental impact, including factors such as energy consumption and carbon footprint?**

A. ☐ I always choose apps that prioritise and promote environmental sustainability and energy efficiency

B. ☐ I occasionally consider the environmental impact when using apps/platforms

C. ☐ I rarely take into account the environmental footprint of the apps/platforms I use

D. ☐ I haven't given much thought to the environmental impact of apps and platforms in my choices

14. **Do you tend to leave your TV/laptop running, even when you're not actively watching/using them (e.g., having the TV on in the background while at home, playing music from your laptop while engaged in other activities)?**

A. ☐ Regularly

B. ☐ Occasionally

C. ☐ Rarely or less often

D. ☐ Never

ANSWERS

Question	Answer	Explanation
1	C	In 2022, it was estimated that approximately 293 billion emails were sent and received each day. This number is expected to increase to over 376.4 billion by 2025 (ADEME et al., 2022).
2	D	A single text-based email has a carbon footprint of about 4 grams of CO_2e (carbon dioxide equivalent), which is equivalent to driving a light-weight car for about 33 metres (European Environment Agency, 2019). Therefore, the carbon footprint of 100 emails is equivalent to driving a car for about 3300 m. The carbon footprint can go up to 50g of CO_2e if it contains attachments.
3	B	Data centres are used to process, organise, secure and store computer data. To fully function, they are composed of a network, storage areas and computing servers. Data centres are dedicated physical infrastructure which houses the crucial applications and data of various organisations. They distribute shared applications and data. These data centres play a vital role in the day-to-day running of businesses and individuals, hosting large quantities of essential data that is vital to their activities.
4	A	Data centres have a continuous need for electricity as they operate 24/7. As they process the constant flow of data, data centres also generate colossal streams of heat that need to be abated to prevent the equipment from malfunctioning. Therefore, they require massive cooling systems. A single data centre can consume the equivalent electricity of 50,000 homes. In total, data centres consume 1% of the global electricity demand, contributing to 0.3% of all global CO_2 emissions.
5	A	Streaming a video requires more energy than watching a downloaded video as it mobilises several equipment to run: Multiple servers, one or several devices at home (screen, computer, tablet, wireless router, etc), and all this stream of data needs to be mobilised again if you want to watch the video again.
6	D	In 2018, video streaming accounted for 80% of internet usage worldwide. It was even higher during COVID19 and it keeps increasing.
7	A	Video on demand services represent 34% of data used for online video, 20% of total data flow and 7% of total GHG emissions of the digital sector.
8	C	On-demand streaming platforms such as Netflix and Amazon Prime host 34% of videos and represent 7% of the digital carbon footprint (ADEME et al., 2022).
9	C	According to a report by Global WEb Index in July 2021, the average time spent on social networks per day is 2 hours and 24 minutes, which is an increase of 2 minutes compared to 2019.
10	B	The most data consuming feature on social media with the highest environmental impact is video (shared and streamed) (ADEME et al., 2022).
11	A	The smartphone is the most used digital device worldwide. In 2023, more than 96.4% of the people with the capacity to use the internet possessed a smartphone. In comparison, 19.8% of the world's internet users possess a gaming console.

12	A	The phase of the life cycle of a digital device with the worst environmental impact is the production of electronic devices (TV, phone, tablets) as the process of manufacture (from mining materials to delivery) represents 78% of the environmental impact of a digital device.
13	C	A study conducted by researchers from McMaster University in Canada found that manufacturing a typical laptop computer emits approximately 270 kg of CO_2, equivalent to driving a car for about 1,600 km.
14	B	Only 17% of e-waste produced in 2019 reached formal management or recycling facilities, according to the most recent GESP estimates, the rest was illegally dumped, mainly in low- or middle-income countries, where it is recycled by informal workers (World Health Organisation, 2021).
15	C	When managing your passwords, use a solid password, long and complex with special characters, and use a different one for each access (CyberMalveillance.Gouv.fr, 2019).
16	C	When browsing the web, an average internet user yearly needs about 365 kWh of electricity and 2,900 litres of water, which corresponds to the CO2 that is emitted when you travel 1.400 km by car (Energuide, 2020).
17	B	According to a report by The Shift Project (2019), a French think tank, the global carbon footprint of digital technologies was estimated to be around 3% of global greenhouse gas emissions in 2018. This is comparable to the emissions produced by the civil airline industry.

Question	Score A	B	C	D	Fact
1	4	3	2	0	75% of all emails are spam, usually never opened and stagnant in your mail-boxes! (ADEME et al., 2022)
2	0	3	1	0	Where you send your email matters for the environment! The carbon footprint of sending an email from Europe to Asia is 10 times higher than the footprint of an email sent within Europe (Energuide, 2020).
3	4	3	2	0	For a device to perform optimally, it needs at least 20% of free storage space.
4	4	2	1	0	Data centres contribute to 0.3% of all global CO2 emissions (DATA4, 2023).
5	4	3	1	0	To compensate for the carbon emissions generated by watching an average-length movie or two back-to-back hour-long episodes of a series, it would require planting at least one tree (IEA, 2023).
6	0	2	3	4	It is always the most environmentally friendly option to use wifi. Mobile data is always more energy consuming with 4G using up to 25 times more energy than wi-fi (ADEME et al., 2022).
7	0	1	3	4	Social media usage constitutes over 5% of global internet traffic. Checking social media is one of the most environmentally taxing digital activities (ADEME et al., 2022).
8	0	2	3	4	Every day, 95 million videos and photos are published on Instagram! (ADEME et al., 2022).
9	4	3	1	0	In 2024, more than 5.61 billion people had at least one digital device, a smartphone (DataReportal, 2024).
10	4	2	0	0	Buying a reconditioned phone rather than a new one can reduce your digital environmental impact and avoid the extraction of 70 raw materials for a smartphone (ADEME, 2021).
11	0	2	3	4	Intensive marketing strategies can create a sense of urgency or desire for the latest product, despite your current device still functioning. This phenomenon is called psychological obsolescence (Spinney et al., 2012).
12	4	3	2	1	On average, each website generates over 21 million cookies per visit, which represents 197 trillion cookies created per user monthly! (IAPP, 2022)
13	4	3	1	0	Android-based platforms consume 5 times less electricity than PC platforms.
14	4	3	1	0	Switching devices off completely as soon as they are no longer in use, at home or at the office enables energy savings and carbon emissions.

YOUR PROFILE

Calculate the Knowledge section

Number of right answers	Key
Between 0 and 4	A
Between 5 and 8	B
Between 9 and 12	C
Between 13 and 17	D

Calculate the Habits section

Number of points	Key
Between 0 and 29	1
Between 30 and 59	2
Between 60 and 89	3
Between 90 and 120	4

Report your results on the table below:

Knowledge	Habits	Profiles
A	1	Profile 1
	2	
	3	Profile 6
	4	
B	1	Profile 1
	2	Profile 2
	3	Profile 3
	4	
C	1	Profile 2
	2	
	3	Profile 3
	4	Profile 4
D	1	Profile 5
	2	
	3	Profile 4
	4	

Discover your profile below:

KNOWLEDGE		
A	0-25%	You're just beginning to discover the environmental impact of digital technology. You are aware that digital technology has an impact on the environment, but you may lack knowledge about the causes of pollution and possible solutions to reduce your impact. Now is the time to learn more about how the digital sector impacts the environment and how you can adopt more sustainable practices.
B	25-50%	You're aware of the environmental impact of digital technology, and can understand how the digital sector can have an impact on the environment. With some effort you could further improve your knowledge and become a real ambassador of the green digital transition. Keep up to date to make progress, you're almost there!
C	50-75%	You are an ambassador of the green digital transition. You have a very good understanding of how the digital sector and our digital habits impact the environment. You would only need some effort to improve further your knowledge and become a real expert. Keep sharing your knowledge around you to raise awareness on the environmental impact of digital technology!
D	75-100%	You are an expert of the green digital transition, the environmental impact of digital technology has no secret for you! You have a thorough understanding of the environmental challenges of digital technology. You must now raise awareness around you and give advice to enable others to contribute to the green digital transformation!

HABITS		
1	0-25%	You are active online and frequently use energy-intensive devices and services which can have a significant environmental impact. You may want to adopt a few measures to reduce your overall impact to transition toward more eco-friendly digital habits. There are lots of simple things you can do to drastically change your impact and become an ambassador of the green digital transition!
2	25-50%	You are a frequent online user and you make efforts to adopt eco-responsible practices. There is room for improvement and you can adopt further energy-efficient practices and use limited resources to make your approach systematic. By adopting only a few more measures, you will rapidly become an ambassador for sustainable digital technology around you!
3	50-75%	You are a true ambassador for sustainable digital technology and you inspire those around you with your eco-responsible practices. You're aware of the importance of reducing your impact and you've taken a number of practical steps to do so. You've put eco-responsibility as a priority of your digital practices and you can become an example to engage others.

4	75-100%	Congratulations! You are a true master of the sustainable use of digital technology. You excel to adopt a systematically eco-friendly approach to the use of digital technologies. You apply thoroughly eco-responsible practices and are actively contributing to a more sustainable digital future. Use your experience to show around you that adopting eco-friendly digital practices is possible and become a role model to engage others to contribute to the green digital transformation!

PROFILES

Profile 1 **Connected Apprentice**

Be open to adopt eco-friendly habits for your daily digital usage.

Discover more about the fundamental notions of the environmental impact of digital technology by consulting resources from the eGreen project:

- Study - Green digital transition in the EU
- Kit for professionals - Reducing the impact of digital practice on the environment
- Training - The impact on the environment of digital technology
- https://egreen.adice.asso.fr/

Implement simple measures to rapidly reduce your impact:

- Deactivate autoplay on streaming platforms
- Do not reply or send unnecessary emails
- Do not use cc in emails, if not necessary
- When doing a research on a navigator, use the address bar over the engine bar
- Turn your devices off when not in use
- Take precautions to maximise the lifespan of your digital devices
- Dispose of your device only when not usable and irreparable

More resources: The Shift Project, ADEME, UN Environment Programme.

Profile 2	**Conscious Navigator**	Deepen your knowledge about green digital practices by consulting resources from the eGreen project: • Study - Green digital transition in the EU • Kit for professionals - Reducing the impact of digital practice on the environment • Training - The impact on the environment of digital technology • https://egreen.adice.asso.fr/ Set realistic objectives to reduce the environmental impact of your digital practices: • Consider buying second-hand devices • Delete emails and files regularly • Share files through links to cloud rather than attaching them to your emails • Prioritise Wi-Fi over Mobile Data • Do not stream videos on more than one device at the same time • Set power-saving settings on your devices • Try to find recycle options for your devices when you are no longer using them Encourage friends and family to adopt eco-friendly digital habits by sharing your experiences. Stay updated on emerging sustainable technologies.
Profile 3	**Digital Citizen**	Continue to evaluate your digital habits periodically and keep deepening your knowledge about the green digital transition. Set achievable goals for improvement: • If your device no longer functions, prioritise repair over the purchase of a new product • If irreparable, systematically buy reconditioned devices • Use sustainable internet navigators • Use low resolution when watching videos • Set up rules to filter emails automatically • Reduce screen time on devices by setting up a screen limit on my devices • Recycle systematically your devices Consider participating in community initiatives or workshops focused on green digital transition. Explore eco-friendly technology certifications or courses to expand your expertise.

Profile 4	**Connected Sage**	Stay informed about the latest developments in green digital practices. Raise awareness around you to contribute to the green digital transformation. Consider volunteering or mentoring opportunities to educate others on eco-friendly digital habits. Maintain effort to lower your impact: • Buy digital devices only when necessary • Solely buy or acquire sustainable and repairable devices • Save all of your digital files locally • Use a sustainable cloud storage software • Systematically recycle or upcycle unused digital device Explore eco-friendly technology certifications or courses to expand your expertise.
Profile 5	**Enlightened Observer**	Be open to adopting eco-friendly habits for your daily internet usage. Start by adopting easy to implement measures to gradually reduce your impact: • Deactivate autoplay on streaming platforms • Do not reply or send unnecessary emails • Do not use cc in emails, if not necessary • When doing a research on a navigator, use the address bar over the engine bar • Turn your devices off when not in use • Take precautions to maximise the lifespan of your digital devices • Dispose of your device only when not usable and irreparable Raise awareness around you to contribute to the green digital transformation.
Profile 6	**Oblivious ecologist**	Continue to evaluate your digital habits periodically and stay informed about the latest developments in green digital practices. Learn more about the environmental impact of digital technology: • Study - Green digital transition in the EU • Kit for professionals - Reducing the impact of digital practice on the environment • Training - The impact on the environment of digital technology More resources: The Shift Project, ADEME, UN Environment Programme.

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