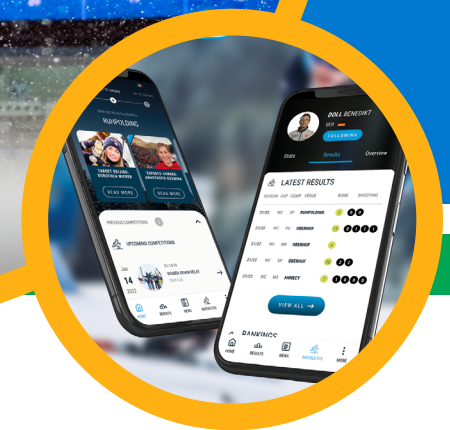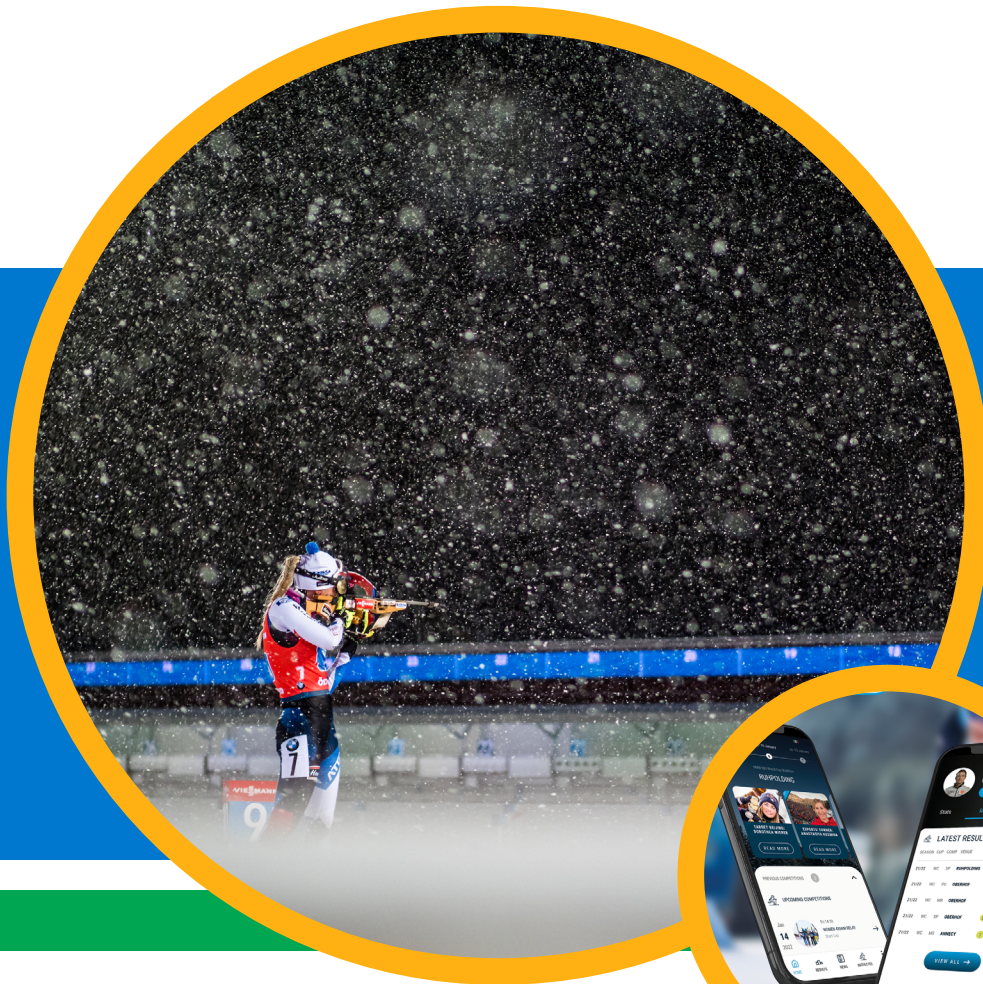INTERNATIONAL **BIATHLON** UNION

International Olympic Committee

IF SUSTAINABILITY PROJECT
IBU MAKING ITS DIGITAL ECOSYSTEM MORE SUSTAINABLE

NOC AND IF SUSTAINABILITY CASE STUDIES

The world faces significant challenges across a wide spectrum of economic, social and environmental matters. The Olympic Movement has both an opportunity and a duty to actively contribute to the global sustainability debate in line with its vision of "building a better world through sport".

With this in mind, and in response to Olympic Agenda 2020, the International Olympic Committee (IOC) launched the International Federation (IF) Sustainability Project in 2016 to obtain an overview of IFs' sustainability initiatives – identifying common topics, challenges and good practices while also sharing information among the IFs. One outcome of the project was a series of case studies illustrating how IFs are actively contributing towards a more sustainable world.

As part of the IOC's objective to "profile the role of the Olympic Movement in sustainability through the aggregation of information and collective reporting", it was agreed that the identification and sharing of information contribute to the holistic integration of sustainability and should be continued.

These case studies, which now also showcase the best practices of National Olympic Committees (NOCs), form part of a strategic support system made available to the Olympic Movement through the IOC Sustainability Strategy. Each case study is aligned with one or more of the IOC's five sustainability focus areas: infrastructure & natural sites; sourcing & resource management; mobility; workforce; and climate. They are also aligned with one or more of the United Nations (UN) framework of 17 Sustainable Development Goals (SDGs), which provide a common framework for organisations to explain how they plan to contribute to sustainable development and tackle the key global sustainability challenges.

This framework is pivotal for the Olympic Movement – in September 2015, the UN General Assembly confirmed the important role that sport can play in supporting the UN's 2030 Agenda for Sustainable Development and its SDGs.

The IOC provides support to NOCs and IFs in establishing, designing and developing their sustainability strategies.

"Sport is also an important enabler of sustainable development. We recognise the growing contribution of sport to the realisation of development and peace in its promotion of tolerance and respect and the contributions it makes to the empowerment of women and of young people, individuals and communities as well as to health, education and social inclusion objectives."

PARAGRAPH 37, UN 2030 AGENDA FOR SUSTAINABLE DEVELOPMENT

Each NOC/IF sustainability project contributes to one or more of the IOC's sustainability focus areas and one or more of the UN SDGs.

IOC FOCUS AREAS

CLIMATE

UN SDGs

INTERNATIONAL BIATHLON UNION

International Olympic Committee

IBU'S COMMITMENT TO REDUCING EMISSIONS CREATED BY ITS DIGITAL ECOSYSTEM

As part of its commitment to the goals of the UN Sports for Climate Action Framework and the Race to Zero campaign, the International Biathlon Union (IBU) aims to reduce the carbon footprint of biathlon by 50% by 2030 and become net zero by 2040. Managing a sport's carbon footprint requires measurements on various levels. In an increasingly digital world, the carbon foo-tprint of digital services is not insignificant but it is poorly understood. There is little information available about the environmental impact of technology and digital services in general, and sport is no exception. One of the IBU's key sustainability achievements in 2021 was measuring the emissions inventory for biathlon as a sport, including its digital ecosystem.

How digital services generate CO_2 emissions:
Information and communication technologies (ICT) improve our daily lives and help optimise certain processes. However, digital infrastructure and devices are also a source of carbon emissions. Increasing data use, in particular streaming services and new technologies, requires more data transfer and processing. This translates into a need for more and larger data centres, which consume more energy and cause more emissions (estimated at 1.4% - 5% of global greenhouse gas emissions).

In partnership with its digital ecosystem developer Vincit, the IBU calculated the emissions created by its digital ecosystem, which includes its new mobile app and revamped website launched in November 2021, as well as the IBU Data Centre and streaming services provided in cooperation with Eurovision.

The carbon footprint of the IBU's digital ecosystem:
Based on detailed calculations, the estimated carbon footprint of the IBU's digital ecosystem during the 2021/2022 winter season, including emissions from live video streaming, is equivalent to 88 tons of CO_2.

OBJECTIVES
• Measure and understand the carbon footprint of digital services in sport to identify opportunities to reduce the impact.

• Identify steps that both sports organisations and fans (as users of the services) can take to reduce the environmental impact and contribute to climate action.

• Collaborate with partners to take concrete action, such as progressively switching to renewable power sources.

With 2 million biathlon fans using these services, the emissions per user are not large. The total is also not alarming when compared to other sources of the IBU's emissions, such as travel and energy consumed at events. However, the IBU decided to compensate for this impact by buying offsets from the UN Carbon Offset Platform, to ensure its new digital ecosystem is climate neutral from the start.

Following the first season of the new ecosystem's operations, the IBU can now verify measurements against actual data. More importantly, in collaboration with its digital ecosystem partners Vincit and the European Broadcasting Union, the IBU aims to reduce and optimise the amount of data transferred, for example by better adapting videos and images to end-user devices and screen sizes, as well as using on-demand capacity instead of dedicated capacity in data centres.


Moreover, the IBU aims to switch to renewable energy solutions, especially in data centres, and engage with the various parties involved in the digital supply chain. The IBU will be working with its hosting service provider, Amazon Web Services, to track and reduce emissions in the future.

Everybody can contribute to reducing emissions:
The IBU is encouraging everyone to take small actions in their daily lives to reduce their digital carbon footprint, which can make a huge overall impact. Some easy opportunities include switching to Wi-Fi or LAN instead of using mobile data whenever possible, making sure that digital devices are powered by renewable energy sources, using devices as long as possible, and recycling them appropriately.

BENEFITS

• Engage with companies in the digital supply chain, gathering information about energy efficiency and consumption to collaboratively find ways to reduce emissions.

• Enhance transparency in the organisation and assume accountability for the emissions caused by digital services.

• Use the sport's global platform to inspire other organisations to create and share concrete initiatives and best practices to reduce their digital carbon footprint.
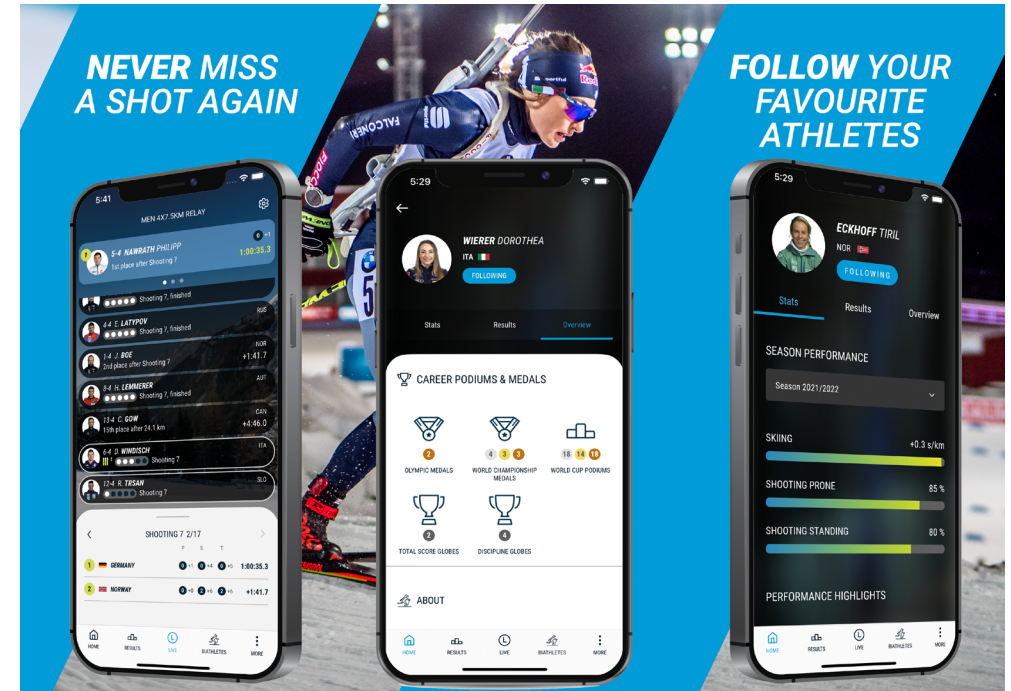
"We are still in the early phases of implementing our long-term strategy and raising more awareness among our stakeholders about how we can become better custodians of the planet. As we mature in our approach to sustainability, we will also further improve our measurement and data collection and provide even better analysis and reporting on our progress."

OLLE DAHLIN, IBU PRESIDENT