



# Carbon Management Plan of the International Biathlon Union („IBU“)

(Version 2.0, Date 14/12/2021)

## **Change History:**

Version	Author	Description of change	Date of change
1.0	Riika Rakic	Version 1.0 - original	30/08/2020
2.0	Riika Rakic	Version 2.0	14/12/2021

## **Approval:**

Version	Approved by	Date of approval
1.0	Niklas Carlsson	31/08/2020
2.0	Niklas Carlsson	14/12/2021



## TABLE OF CONTENTS

---

1. Introduction .....	3
2. IBU Emissions 2020 vs 2021 .....	4
3. Level 1: IBU as an Organization .....	4
3.1 Scope 1: Direct emissions.....	5
3.2 Scope 2: Indirect emissions from purchased electricity IBU Office (Headquarters).....	5
3.3 Scope 3: Indirect emissions from.....	5
3.4 The L1 calculation excluded the following:.....	6
4. Level 2 IBU Events.....	7
5. Carbon Management Plan.....	7
5.1 Level 1 - IBU as Organization .....	8
5.2 Level 2 - IBU as Event Owner.....	8
5.3 Level 3 - IBU as Leader of Biathlon Family .....	8
5.4 Level 3 - IBU as Leader of Biathlon Family .....	8
6. Carbon Reduction Plan .....	10
7. Partnerships .....	18
8. Annex.....	19
8.1 IBU as Organization: Travel Emission Comparison 2020 vs. 2021.....	19



## 1. Introduction

Reducing greenhouse gas emissions is the best way of combatting climate change and as such, a priority for sport organizations. Many of them, including the IBU, are severely impacted by climate change yet are also significant contributors to the issue through their own activities and events.

Following its *Target 26* strategic plan, the IBU has taken the first steps on its climate / carbon journey, such as the “establishment of sustainability initiatives targeted to decrease the footprint of IBU events” and joining the United Nations Sport for Climate (UNFCCC S4C) Action Framework in June 2020.

The IBU renewed its commitment to the UNFCCC S4C framework by joining the Race to Zero campaign in November 2021. The Race to Zero pledge aligns with the IBU’s strategic climate goal for 2030 which entails a reduction of 50% of the sport’s emissions by 2030, but also includes the commitment to become net zero by 2040.

This IBU Carbon Management Plan 2.0 (2021) represents another step forward, reviewing and refining the concrete actions to be undertaken by the IBU in 2022 that will allow it to lead the global biathlon family by example. It forms a core part of the implementation of the IBU’s Sustainability Strategy 2020-2030. It commits the IBU to several measures that will help biathlon realize its strategic climate objectives, i.e., reducing emissions in accordance with its UNFCCC S4C commitment and becoming climate neutral as a sport by 2030. Notably, it represents an expanded scope, moving beyond ‘the IBU as an organization’ to the ‘IBU events’ that will be fully included over the next few competition seasons.

**In accordance with the IBU’s commitment to the Race to Zero, the v3.0 of this document will include a detailed milestone plan, outlining how the IBU aims to meet its pledge for the 50% emission reduction by 2030.**



## **2. IBU Emissions 2020 vs 2021**

Greenhouse gas emissions are typically measured in kilograms or tons of “carbon dioxide equivalent” (CO<sub>2</sub>e). As a starting point, an initial baseline level of CO<sub>2</sub>e emissions was established for the “IBU as an organization” (Level 1) using available data from the 2019/20 competition season. The 2021 calculations are informed by these figures but represent a qualitatively higher and expanded dataset for Level 1 while including an initial calculation based on the COVID-19 impacted scenario for Level 2, ‘IBU Events’.

## **3. Level 1: IBU as an Organization**

The Level 1 or ‘IBU as an Organization’ includes the IBU headquarters in Anif bei Salzburg, Austria as a facility.

In terms of travel, the following groups of individuals were included in Level 1:

- IBU Executive Board
- IBU staff (including contractors)
- Biathlon Integrity Unit (BIU) staff and Board
- IBU Technical and Athletes Committee members
- IBU Technical officials (IBU appointed)
- IBU media team (contractors)
- IBU accreditation (Plaras), timing & data (SIWI), and anti-doping teams (contractors)



The L1 2021 carbon footprint calculation included the following sources of emissions:

3.1 Scope 1: Direct emissions

- IBU Office (Headquarters)
- Heating/Cooling (gas)

3.2 Scope 2: Indirect emissions from purchased electricity  
IBU Office (Headquarters)

- Power

3.3 Scope 3: Indirect emissions from

- Business travel in leased, rental or employee cars, trains, ferries, or airplanes
- Employee commuting, such as light rail, train, buses, and employee private cars
- Accommodation and board for staff during travel or IBU's own events
- Outsourced shipping & courier services
- Office waste
- Estimates on production of materials and resources, such as furniture, paper, IT.
- IBU's own events including the Presidents' Meeting 2021, OC Meeting 2021, IBU Technical Committee meeting, annual EB meetings and other internal meetings including related overnight stays
- Printing services
- Supply chain embedded carbon for the IBU's material distribution program
- IBU staff uniforms (annual value of multi-year contract)



### 3.4 The L1 calculation excluded the following:

- Other supply chain embedded carbon
- Certain IBU's own events such as the IBU-IOC camps and working group meetings
- Digital eco-system

The estimated carbon footprint of the 'IBU as organization' Level 1 covers the twelve months from 1 October 2020 until 30 September 2021 (IBU Reporting Period):

<b>IBU as Organization</b>	<b>Season 2021</b>	<b>Season 2020</b>	<b>Change</b>
IBU Office	73'210	41'359	+77%
IBU Material Support	269'044	n/a	n/a
IBU Own Events	157'900	489'900	-68%
IBU Officials Travel	303'381	542'838	-56%
<b>Total CO2e kg</b>	<b>799'215</b>	<b>1'074'097</b>	
<b>Total CO2e tons</b>	<b>804</b>	<b>1'074</b>	<b>-25%</b>

<b>Scope division - 2021</b>	<b>Scope 1</b>	<b>Scope 2</b>	<b>Scope 3</b>
IBU as Organization	31187	1099	766'928
<b>Total CO2e tons</b>	<b>31</b>	<b>1</b>	<b>771</b>

This calculation covers a period heavily impacted by the COVID-19 pandemic which led to restricted travel activity and fewer IBU's own events delivered. Also, this being the second time that the IBU calculated its organizational carbon footprint, some data are now of higher quality, meanwhile some data are still not available which has led to informed estimates and proxies being used in some cases. Notably, the IBU material support program was only included in 2021 and is calculated based on € value of the goods.

The IBU Office figures for 2021 reflect a full year in the new office building where gas rather than renewable energy is used for heating / cooling.



#### 4. Level 2 IBU Events

For Level 2, it should be noted that the IBU competition season 2020/2021 followed a special Covid-19 safety plan and comprised a limited number of events and locations. The season also did not feature any overseas competitions and all events took place without spectators. The data represent an extrapolation based on data and calculations by 50% of the organizers using the special IBU CO2 foot printing tool developed by Quantis International.

The estimated carbon footprint of Level 2 covers the IBU competition season from 1 November 2020 - 30 September 2021:

<b>CO2e kg</b>	<b>Scope 1</b>	<b>Scope 2</b>	<b>Scope 3</b>
IBU World Cups, WCH / SBWCH	526'813	87'799	3'587'911
IBU Cup, EOCH	n/a	n/a	n/a
Junior Cup, YJWCH	n/a	n/a	n/a
<b>Total CO2e ton</b>	<b>527</b>	<b>88</b>	<b>3588</b>
<b>GRAND TOTAL CO2e ton</b>			<b>4'203</b>

Due to Covid-19, the IBU and IBU Junior Cups and related championships followed very strict health and safety protocols, which led to a restricted calendar and implied severe participant number limits. As a result, emissions data for these series were not available for 2021.

#### 5. Carbon Management Plan

Within the IBU Sustainability Strategy 2020-2030, the strategic objective for the Climate Focus Area is as follows:

*Reduce the carbon footprint of biathlon as a sport according to science-based targets (4.5% p.a.) to become climate neutral by 2030, and climate positive latest by 2034.*



The corresponding high-level targets for the Climate Focus Area per sustainability stakeholder level are as follows:

5.1 Level 1 - IBU as Organization

By 2030, IBU achieves climate neutrality from 2020 emissions baseline for Scope 1-3 through reduction activities according to science-based targets (4.5% p.a.), primarily in travel and energy use-based greenhouse gases, and through offsets for any residual emissions.

5.2 Level 2 - IBU as Event Owner

100% of WCH from 2027 and 100% of World Cups from 2026 commit to a carbon management program (reduction/offsetting, as for L1) based on science-based targets and achieve climate neutrality by 2030 concerning their event's GHG emissions (Scope 1-3) compared with the baseline of season 2019 (adjusted to account for calendar fluctuations within a four-year period)

5.3 Level 3 - IBU as Leader of Biathlon Family

By 2030, 50% of NFs join UN Sports for Climate Action Framework and/or commit to a carbon management program with individual goals

5.4 Level 3 - IBU as Leader of Biathlon Family

By 2030, 100% of IBU partners have express commitments for carbon management and climate action

Achieving these goals will require that the IBU is able to ensure a sustainable delivery of all its business and event operations and has a range of policies and actions in place which limit the negative impact on climate and the environment. In particular, the IBU plans to use and promote the use of renewable energy and implement sustainable mobility measures. It will also work to raise awareness and encourage active participation in the realization of the carbon management plan among all IBU stakeholders.

Considering the difference between seasons in terms of the number of competitions outside of Europe and the global COVID-19 pandemic, the final IBU Event Series carbon footprint baseline will be set to reflect a four-year average (Olympic period 2018-2022), however noting the impact of the pandemic, and reflecting as much as





possible the pre-pandemic level in 2019. This four-year average baseline will then be used to determine the carbon reduction milestones going forward. The specific milestones for the Level 2 'IBU Events' will be defined in cooperation with the organizing committees to set targets that are relevant and realistic on the way to 2030. The milestones will generally be based on an annual target of 4.5% for reduction based on the 2019 figures.

The IBU will seek to offset its residual emissions remaining after the carbon reduction measures have been implemented, to ensure that both Level 1 and Level 2 are climate neutral as soon as possible, latest in 2030. Innovative plans will be required to reduce and eventually offset for the impact on climate caused by spectator travel.



## 6. Carbon Reduction Plan

At Level 1, the 'IBU as Organization' will reduce its carbon emissions according to science-based targets (4.5% p.a.) annually from the 2019-20 baseline level until 2030. To achieve this target, we will:

- Implement a prioritized list of carbon emissions reduction projects as detailed below.
- Increase stakeholder (IBU/BIU staff and board, committee member, technical official, contractor, service provider and partner) awareness of the importance of reducing energy and fossil fuel consumption so that this principle can be incorporated into their everyday lives.
- Implement policy and procedure changes that will help reduce emissions across the IBU's internal operations.

*The activities in the carbon reduction plan will be updated regularly, at least annually, as the program progresses.*

Level 1: IBU as Organization						
Scope	Project	Lead	Resources	By when	Status 2021	Actions 2022
Travel	Transition IBU corporate cars (BMW lease) from diesel to hybrid / electric cars	Sport & Events (Felix)	Admin (Margit)	Partial hybrid fleet (3) for two seasons 2020/21 & 2021/22 from Sept. 2020 - Based on findings, additional cars to be added (hybrid/electric)	3 of 11 cars are hybrid cars (27%)	Increase to 50% hybrid or electric cars



Travel	Implement IBU-owned recharging station for staff and visitors	Admin (Margit)	Admin (Carola)	By September 2020	One charging station for two cars	Increase number of charging stations to 3
Travel	Issue new sustainable travel policies for staff, contractors & officials  Inform all relevant groups  Brief the new travel agencies on new policy and track their performance against on reduction goals	Admin (Margit)  Admin (Margit)	Central (Riikka)  All depts  Sport & Events (Tina/ Sarah)	From November 2020  Ongoing  Ongoing	New travel policy for staff included in IBU Staff Handbook issued in 2021	Travel policy for IBU Officials to be decided at Congress 2022



**IBU**

Travel	Ensure that each department commits to a minimum of 5% annual reduction in team travel emissions	Central (Niklas)	All depts	By December 2020	Reduction in every department (up to 75%) except Development and Administration (more staff), note impact of COVID-19!	Keep minimum of 5% annual reduction from 2019/2020 as baseline year
Travel	Develop concept for a company bicycle program (government supported)	Admin (Margit)		By December 2020	In progress (1x normal bike, 1x Cargo bike), to be delivered early 2022	Delivery latest in Q2/2022
Own events	Implement policy that a minimum 20% of EB meetings are held virtually	Central (Niklas)		By December 2020	Completed. New EB annual cycle formalized four annual meetings: February, June, September, November	Include a sustainable event requirements list in the Congress 2024 host questionnaire
Own events	Develop an IBU Own Events Sustainability	Sport & Events	Central / Developme	By October 2020	Completed and being implemented.	Create a revised Checklist v2.0 with



**IBU**

	Checklist, v1.0 and apply to all upcoming events	(Tina/Sarah)	nt (Theresa / Riikka)			priorities and fulfil for every event
Own Events	Increase IBU Own Events scope and data collection to cover all IBU organized events, including IBU/IOC camps and any activities by the new IBU Academy	Developm ent (Theresa)	Developme nt (Dagmara)	From January 2021	In progress.	IBU Academy to launch in Q1/2022.
Office - waste	Enhance waste management implementation and add recycling categories  Obtain exact category weights	Admin (Margit)	Developme nt (Theresa)	By October 2020  From January 2021	Recycling categories have been implemented but coordination with the cleaning staff is difficult  No success with Campus cleaning staff	Add "How to recycle" instructions in every kitchen; hire IBU own cleaning staff who will take care about the correct disposal of waste (recycling)



**IBU**

Office - energy	Obtain precise power and heating/cooling measurements via own meters	Admin (Margit)	Development (Theresa)	From January 2021	In progress	Initiate dialogue on higher level with landlord / Campus to install own meters
Office - energy	Assess potential of implementing solar panels on the IBU office roof	Admin (Margit)	Central (Niklas)	By June 2021	In progress	Address in dialogue with landlord / Campus Conduct HQ energy efficiency measurement with Viessmann
Office - uniforms	Donate all available old IBU uniforms and sport equipment to those in need	Development (Dagmar a)	Sport & Events / Development (Theresa / Tina)	Ongoing	Old equipment distributed during IBU-IOC Camps 2021	Stock currently in storage to be distributed among staff; Alpine Pro Collection to be distributed during IBU-IOC Camps or donated to those in need



**IBU**

Office - print	Transition from Print to Digital Publications	Comms (Christian )	Comms (Jaka, Mariya)	Reduce print production in kg by 50% until end of season 2021/2022 on 2019/2020 baseline	19% reduction by end of 2021	50% reduction by end of season 2021/2022
Office - procurement / supply chain	Develop new procurement instruction	Admin (Margit)	Central (Riikka)	By June 2021	Delayed, new deadline February 2022	Implement new rules, establish a tracking procedure
Office - Wildflower Meadow	Keep a part of the Campus lawn for wildflowers	Development (Theresa)	Admin (Margit / Carola)	By May 2022	In progress, contacted other companies on the Campus	



Level 2: IBU as Event Owner						
Scope	Project	Lead	Resource(s)	By when	Status 2021	New actions
Carbon footprint	Create a simplified carbon footprint measurement tool for IBU events with an initial focus on IBU World Cups and IBU World Championships	Central (Riikka) / Quantis	Sport & Event (Felix, Daniel), Development (Theresa)	11/2020	Completed	Move tool online to ease tracking of annual improvement
	Collect baseline measurements from IBU events, with an initial focus on IBU World Cups and IBU World Championships	Sport & Events (Felix/Daniel) Central (Riikka)	OCs	2020/2021 season	Initial calculations completed by pilot organizing committees	CO2 measurement implemented as contractual obligation on all OCs during the 2021/2022 season Calculate retroactive 2019 baseline





Energy	Conduct a detailed assessment of energy use for events, especially for TV broadcasting	Central (Niklas) / EBU (Franck)	Central (Riikka)	11/2020	Delayed	Identify an external consultant
--------	--	---------------------------------	------------------	---------	---------	---------------------------------

<b>Level 3: IBU as Leader of Biathlon Family</b>						
<b>Scope</b>	<b>Project</b>	<b>Lead</b>	<b>Resources</b>	<b>By when</b>	<b>Status 2021</b>	<b>Actions 2022</b>
NFs	Support 10 NFs in developing sustainability strategies and carbon management plans	Central (Riikka)	Development (Dagmar a)	End of 2022	No NFs applied for IBU development support in sustainability Established dialogue with key NFs	Separate sustainability support funding from general development support funding
Supplying partners	Include IBU sustainability annex and code of conduct in all supplying partner contracts for 2022-2026	Sport & Event (Felix, Daniel)	Central (Riikka)	Q2/2022	Introduced new annexes to supplying partners in October 2021	Engage in dialogue and complete contracts Q2/2022



## **7. Partnerships**

The IBU has established relationships with selected organizations to promote climate advocacy and action.

Protect Our Winters (POW) Europe is represented in the IBU Sustainability Expert Reference Group (ERG) and has served as a key partner for the IBU in providing training and tools for the inaugural group of the IBU's Sustainability Ambassadors who were appointed in June 2021.

In April-May 2021, the IBU ran the so-called Biathlon Climate Challenge together with Active Giving using their application platform that converts physical exercise into trees. The campaign resulted in the planting of 100'000 trees through Active Giving's partner charity Eden Reforestation Projects. The IBU expects to expand this project to further IBU stakeholders during the upcoming competition seasons.

The IBU has also worked with Lausanne-based climate consultancy Quantis International to develop a template for calculating the carbon footprint of the IBU's events in an efficient yet accurate manner. Completing this measurement is contractually mandated for IBU events from the 2021/2022 season onward. In the future, the excel based tool will be made available online.

Most recently, the IBU has also partnered with its long-term sponsor Viessmann to conduct an industry grade energy efficiency measurement at select venues, beginning with a leading World Cup organizer and to be followed by the IBU's own headquarters. This is to validate the emission accounting approach and ensure continuous measurement as well as to identify and implement reduction measures available for the IBU event series organizers.



## 8. Annex

### 8.1 IBU as Organization: Travel Emission Comparison 2020 vs. 2021

The following table shows the department level comparison of IBU's travel emissions for 2020 vs 2021.

Due to the global pandemic, travel continued to be severely restricted for most of the reporting period (from 1 October 2020 - 30 September 2021) and consequently, there was an almost 50% reduction in emissions from travel in comparison to the previous reporting period, where an almost 'normal' competition season could be completed.

The increase in travel and corresponding emissions in the two departments where this is the case, the change can be explained by additional staff members joining the team during 2021.

	2019/2020			2020/2021				Reduction	2019/20		2020/21	
	Bus. Travel (7M)	12M	Total	Commuting	Bus. Travels	Total	2019/20		2020/21	Train		
Central	88174.57	151156.40	151156.40	1887.80	145565.18	147452.99	-3%	10745	3.25%	15502	3.74%	
BIU	13397.64	22967.38	22967.38	3459.32	2714.73	6174.05	-73%	3176	4.34%	2891	7.59%	
Communication	37833.97	64858.24	64858.24	3708.54	10752.95	14461.50	-78%	7290	2.80%	6780	7.30%	
Development	1479.37	2536.06	2536.06	5577.42	3519.06	9096.48	359%	1700	10.98%	62	0.12%	
Sport & Event	147019.45	252033.35	252033.35	14591.92	50220.48	64812.40	-74%	3530	0.55%	5541	1.32%	
Administration	1430.81	2452.82	2452.82	5934.30	13.31	5947.61	242%	3960	19.60%	864	2.63%	
Plaras	8325.03	14271.49	14271.49	0.00	6582.88	6582.88	-54%					
Siwidata	14769.09	25318.44	25318.44	0.00	7339.48	7339.48	-71%					
IBU Pool Cars	4225.84	7244.30	7244.30	0.00	4425.19	4425.19	-38%					
		kg CO2e	542838.46		kg CO2e	266292.57						