# ITU CARBON FOOTPRINT

INTRODUCTION

This document presents the current status of 2019 CO_2 emissions from ITU air travel around the world at the end of October 2018. Despite not all emissions are yet evaluated this is by far the most important impact of our activities.

BACKGROUND

- Early 2019, the Executive Board signed the Sport for Climate Action Network (SCAN), a IOC/UNFCC sectoral initiative to invite sport industry to display climate leadership by engaging actively and collectively in the climate neutrality journey, in turn helping to differentiate from competitors, build brand reputation and engage their sports personnel, employees and members on environmental issues.

- SCAN recognize that the Paris Agreement represents a global response to the scientific consensus that human activity is causing global average temperatures to rise at unprecedented rates; and Sports organizations need to take an active part in contributing to the realization of the Paris Agreement goals to reaching climate neutrality in the second half of the twenty-first century.

- The participants in the Sports for Climate Action Initiative commit to adhere to the following five principles:
  (a) **Principle 1:** Undertake systematic efforts to promote greater environmental responsibility;
  (b) **Principle 2**: Reduce overall climate impact;
  (c) **Principle 3**: Educate for climate action;
  (d) **Principle 4**: Promote sustainable and responsible consumption;
  (e) **Principle 5**: Advocate for climate action through communication.

- The starting point should be to gather information on your current activities to enable you to calculate a baseline climate footprint to provide a quantitative measure of ITU organisation's (or event's) greenhouse gas (GHC) emissions. This will help understand the most significant impacts and guide ITU decision-makers to take actions that will reduce your GHG emissions. The top priority should be to focus on activities that have the highest contribution to your climate footprint. This will help you to select the most cost-effective actions with the highest reduction potential.

- ITU has also signed the Clean Seas initiative.

SCOPE

ITU
ORGANISATION

ITU Stakeholders, Events, NFs, Athletes, Triathlon community
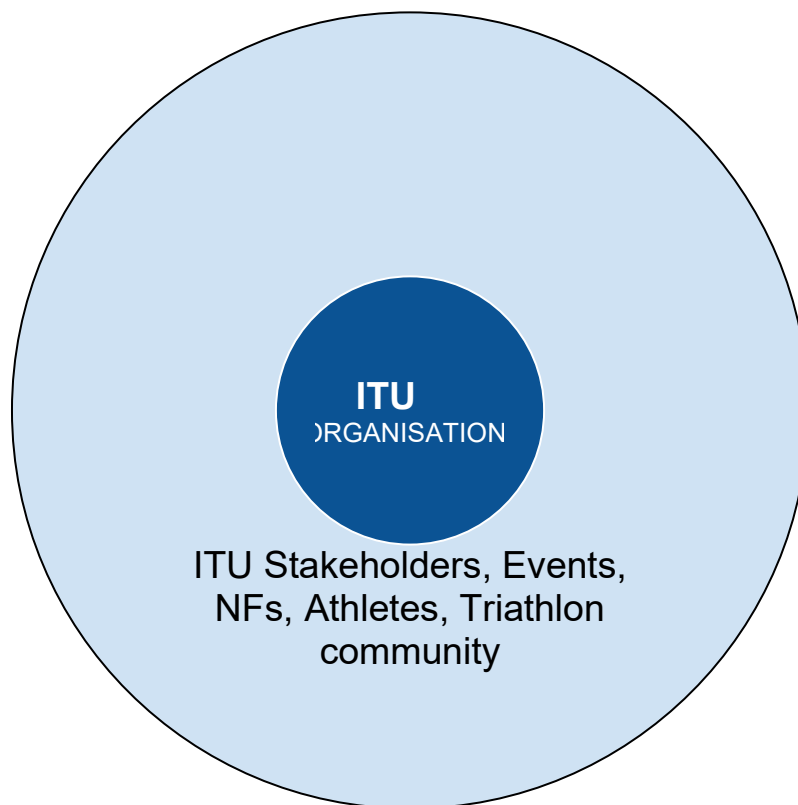
Looking at the principle 2 of the SCAN, we are, at the moment, looking only at the internal activities of the ITU.

The aim is to evaluate the 2019 CO2 emissions for

ENERGY
● Electricity
● Heating

MOBILITY
● Commuting
● *Business Trips - focus de ce document*
● Freight

BOARD (not applicable at organisation level)

MATERIAL AND WASTE
● Paper consumption
● Print material
● Electronic device
● Water

CO2 EMISSIONS FROM AIR TRAVELS

- For only emissions from business trip from air travel are measured. There is no details, process in place yet to capture train or car business travels
- For the time being the period looks at flight from 1 January to 30 October 2019 from SEL.
- This analysis is to be completed by the addition of the flight purchased through SEL for the November and December period, by the emissions from flights purchased directly by the travellers, and the emissions from freight.
- Each travel leg is allocated to an individual, who is tagged to a staff category and a department. The seat class is also taken into consideration as the 1st class / business class emission have higher impact (approx. factor 3 / 2 respectively)
- The CO2 calculator selected is myclimate.org. There are several calculators on the market. This one is a robust and recognized tool.

ANALYSIS (1 Jan - 31 Oct 2019)

- **Total flights:** **1471**
- **Total km:** **4,181,200 km**
- **Total CO2 (tonnes):** **790 t**
- **Total Offset (if decision is to offset):** **EUR18,950**

By "individual" category

We have grouped travellers in x categories:
1. Staff (S),
2. Contracted (C), includes mainly all TV and photograph going to event,
3. Executive Board (EB), includes ITU president
4. Technical Officials (TO), includes all TOs and Medical Delegates going to events
5. Guests (G), and
6. Others (O)

It is to note that in that analysis, ITU president is included in the EB category.

In absolute number, the staff category represents 34% of the total emission (270 t.), Contracted 28% (221 t), and EB and TOs respectively 20% (156 t) and 15% (121 t) of the total emissions. The remaining goes to the Other category (2%) - *see pie chart below*

2019 - t CO2 / category
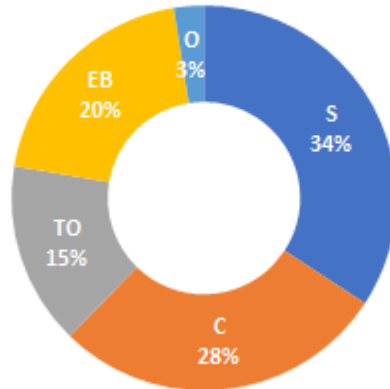
However, it is misleading to only look at the emission per se. It is important to relate the emission per capita of each category in order to make comparisons.

The EB category becomes the primary emitter with 13 t of CO2 per capita, followed very closely by the Staff (9.6 t), Contracted (7.6 t). TOs and O categories have a similar emission per capita with respectively 1.5 t and 1.8 t. - *see bar chart below*

The results of the EB category is largely due the fact ITU president is included in this category (approx. 27% of the emissions of the EB category). Would ITU President be considered as a single category, its emission per capita would reach 42.6 t while the one of the EB category would drop to 10.4 t.
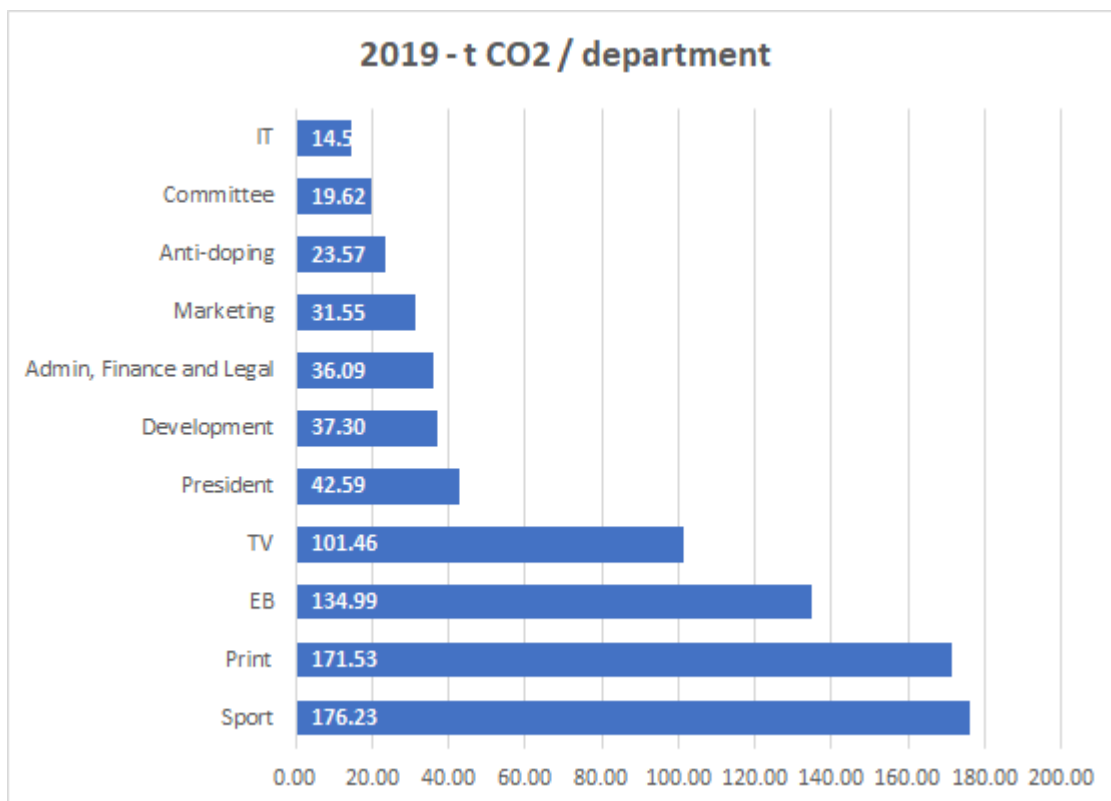
2019 - t CO2 / category / head
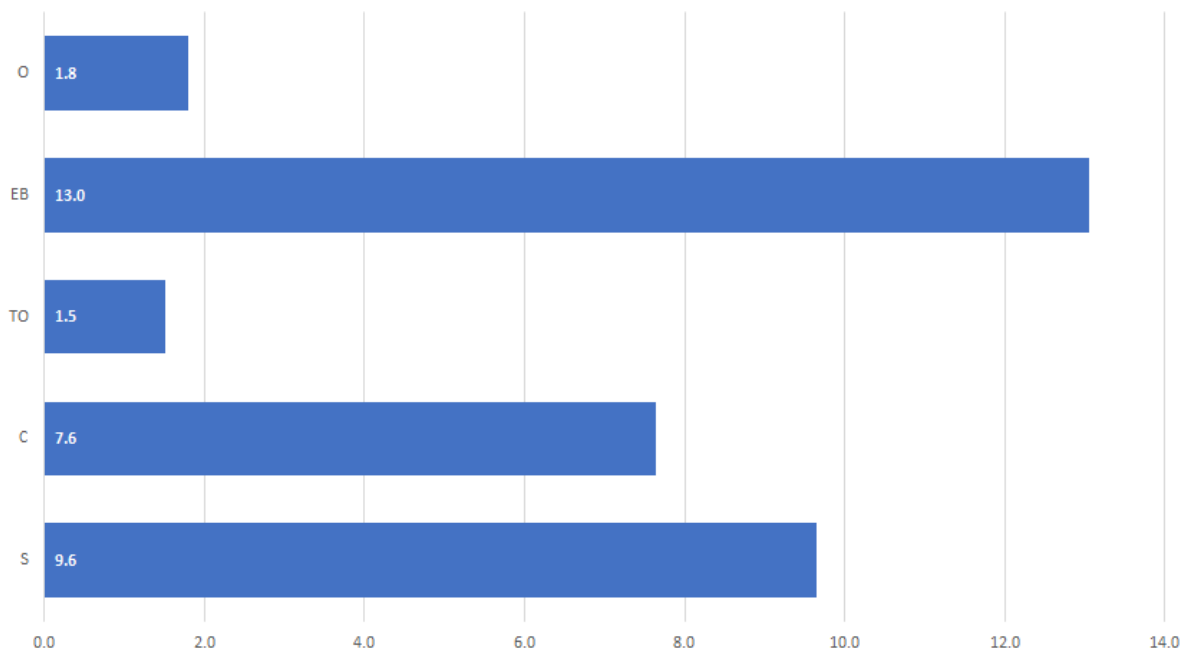
By department

With the help of ITU finance director, the emissions were split among the department supporting the purchase of the flight ticket. They are:
1. Sport
2. Print (Media)
3. TV
4. President
5. EB
6. Admin, Finance and Legal
7. Development
8. Anti-doping
9. Marketing
10. Committees
11. IT

The chart below shows the emission by department.

However, for comparison purpose, it is key to calculate the emission per department and per capita. As per the table below, the President department is by far the biggest emitter simply because all the mileage is done by 1 individual.
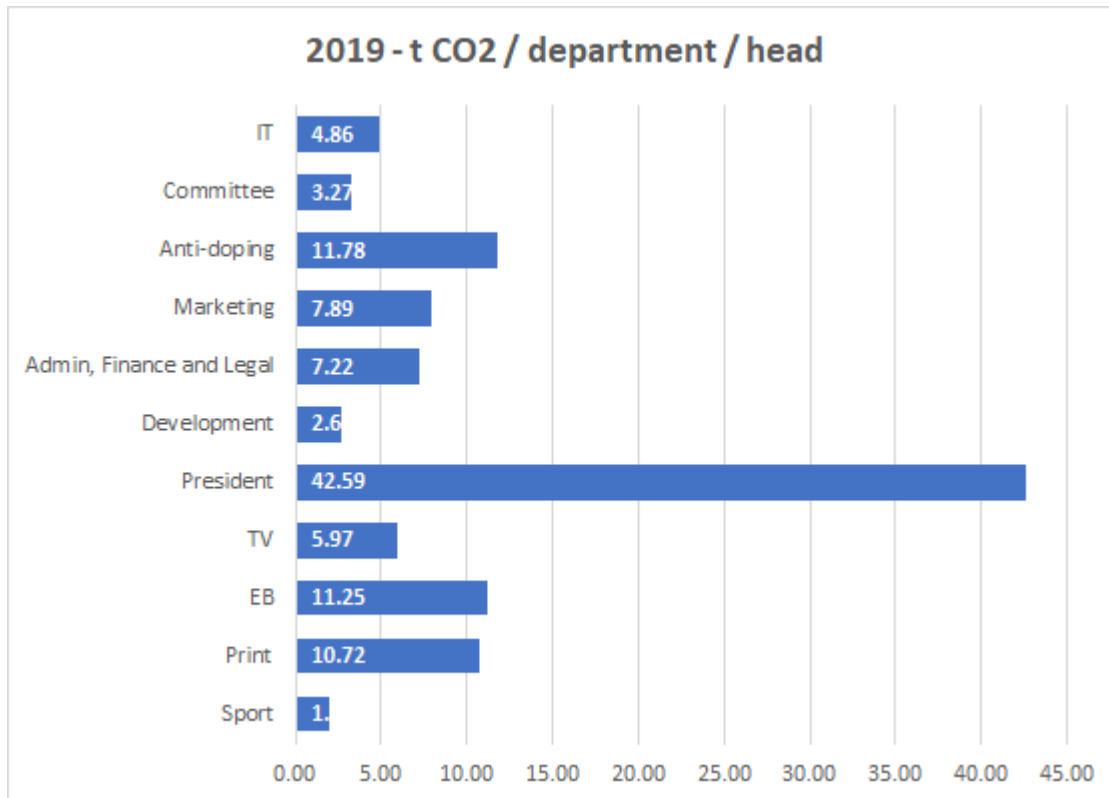
The table below presents a finer analysis of the emission per department per capita as it gives a split per "individual" category. This allow us to clearly identify the emission per individual category for a specific department.

CO2 per dept per category per capita						
Dept	C	EB	O	S	TO	TOTAL
Sport	0	0	0	4.81	1.50	1.98
Print	10.07	0	0.29	20.15	0	10.72
TV	5.76	0	0.55	10.12	0	5.97
Admin, Finance and Legal	0	0	0	7.22	0	7.22
Development	3.31	0	1.65	4.77	0.56	2.66
EB	0	10.36	0	21.01	0	11.25
Marketing	0	0	1.69	14.08	0	7.89
Committee	0	0	3.02	4.43	3.07	3.27
President	0	42.59	0	0	0	42.59
IT	0	0	0	4.86	0	4.86
Anti-doping	0	0	0	11.78	0	11.78

CONCLUSION

Obviously, the aim is to reduce the CO2 emissions caused by air travel, and the simplest way to reduce emissions from air travel is to avoid flying.

However, we must keep in mind ITU main responsibility is to ensure safe and fair event delivery and promote our sport around the world. As such, any decision to cut staff travel could jeopardize the delivery of events and promotion of our sport.

It is proposed for the time being to ask any of us to pay particular attention to the issue.

Here are some points to consider to reduce emissions that the EB could encourage staff/travellers to take or maybe include into travel policy.
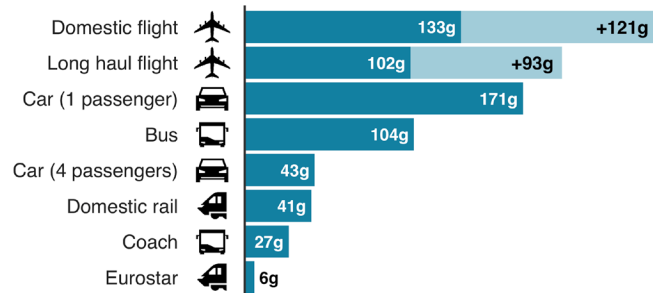
How can we reduce emissions?

- Is the purpose of the trip worth flying?
  All should consider if the purpose of the trip is worth flying. Is there an alternative to flying? Can I group several visits to avoid having to fly back

- Consider virtual meetings before anything else

- Avoid flying for x hour meetings
  Other way to convene should be envisaged if you travel for less than a day meeting

- Privilege direct flights vs multiple leg flights
  It may cost a little extra, but flying nonstop is better for the environment. Not only does it save you valuable time by sparing you a connection, but one flight uses less energy than two. Planes use around 25% of fuel during take-off and are much more fuel-efficient once cruising altitude is reached.

- Fly economy vs 1st/Business
  The factor of a 1st class is 2x, 3x depending on the calculator and distance

- Make train mandatory when distance travelled is below 800 km
  Train virtually always comes out better than plane, often by a lot.

Emissions from different modes of transport
Emissions per passenger per km travelled

■ CO2 emissions ■ Secondary effects from high altitude, non-CO2 emissions

Mode		CO2	Secondary
Domestic flight	✈	133g	+121g
Long haul flight	✈	102g	+93g
Car (1 passenger)	🚗	171g	
Bus	🚌	104g	
Car (4 passengers)	🚗	43g	
Domestic rail	🚆	41g	
Coach	🚌	27g	
Eurostar	🚆	6g	

Note: Car refers to average diesel car
Source: BEIS/Defra Greenhouse Gas Conversion Factors 2019   B B C

- Travel light.
  The more you pack, the more weight you're adding to the plane, which then requires more energy. Despite the fact it will not be captured directly in the analysis, the lighter the plane is the less energy is needed to fly.

NEXT STEPS

Measures of reduction/offset air travel emissions

- Organisation to decide action plan to reduce emission by setting annual goals

- Heads of Departments identify potential CO2 emissions reductions and budget implications.
  - Reviewing travel policies
  - Evaluate virtual meetings vs travel
  - Assess reduction of staff travel on event delivery

- Executive Board identify CO2 emissions reductions and budget implications.
  - # of face to face meeting
  - Business flight ticket policy
  - EB presence to all ITU event
  - Restrict representation within continent of residence

- Consider offsetting CO2 emissions from flights* and ITU facilities in Lausanne, Madrid, Vancouver.
  - Full offset?
  - X% offset?

- Have a session on CO2 emissions from air travels at December staff meeting;

More calculation

- Include SEL invoice for November and December 2019 and include ITU subsidies for ATU travel;
- Get from Finance department the FedEx invoice and SEL invoice related to the shipment of equipment around the world;
- Allow Heads of Department to have a closer look at flight allocations and make adjustments if necessary;
- Get data from ITU offices in Lausanne, Madrid, Vancouver, Budapest to measure emission from offices;
- Develop leaner and less time-consuming process to collect data;
- Consider offsetting CO_2 emissions from business flights and ITU facilities in Lausanne, Madrid, Vancouver;
- Consider the impact on the major events (Games-World Championship/GF);
- Have an awareness raising session re CO_2 emission from air travels at December staff meeting.