

IATA's view on SAF deployment on a global level

IEA AMF Online workshop on Monitoring fuels for aviation

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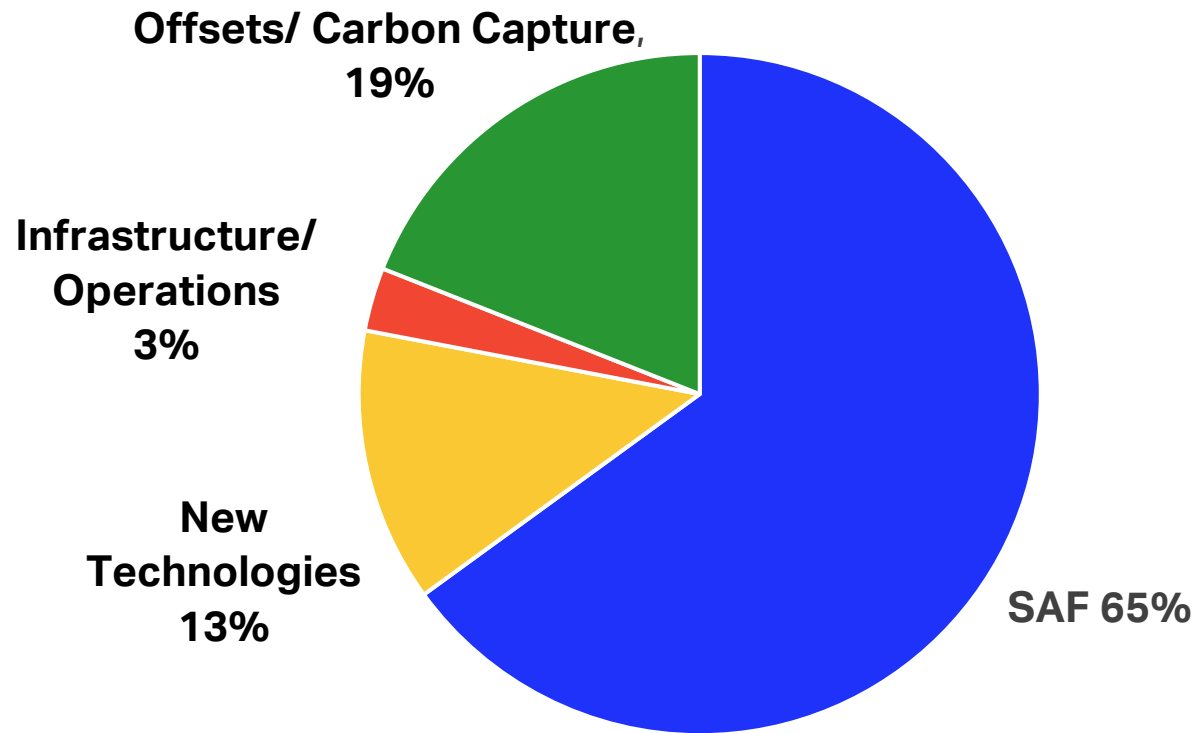
Our commitment:

TO ACHIEVE NET ZERO CARBON EMISSIONS BY 2050

Target aligned with the global community's broader commitment to tackling climate change and minimizing the global temperature increase

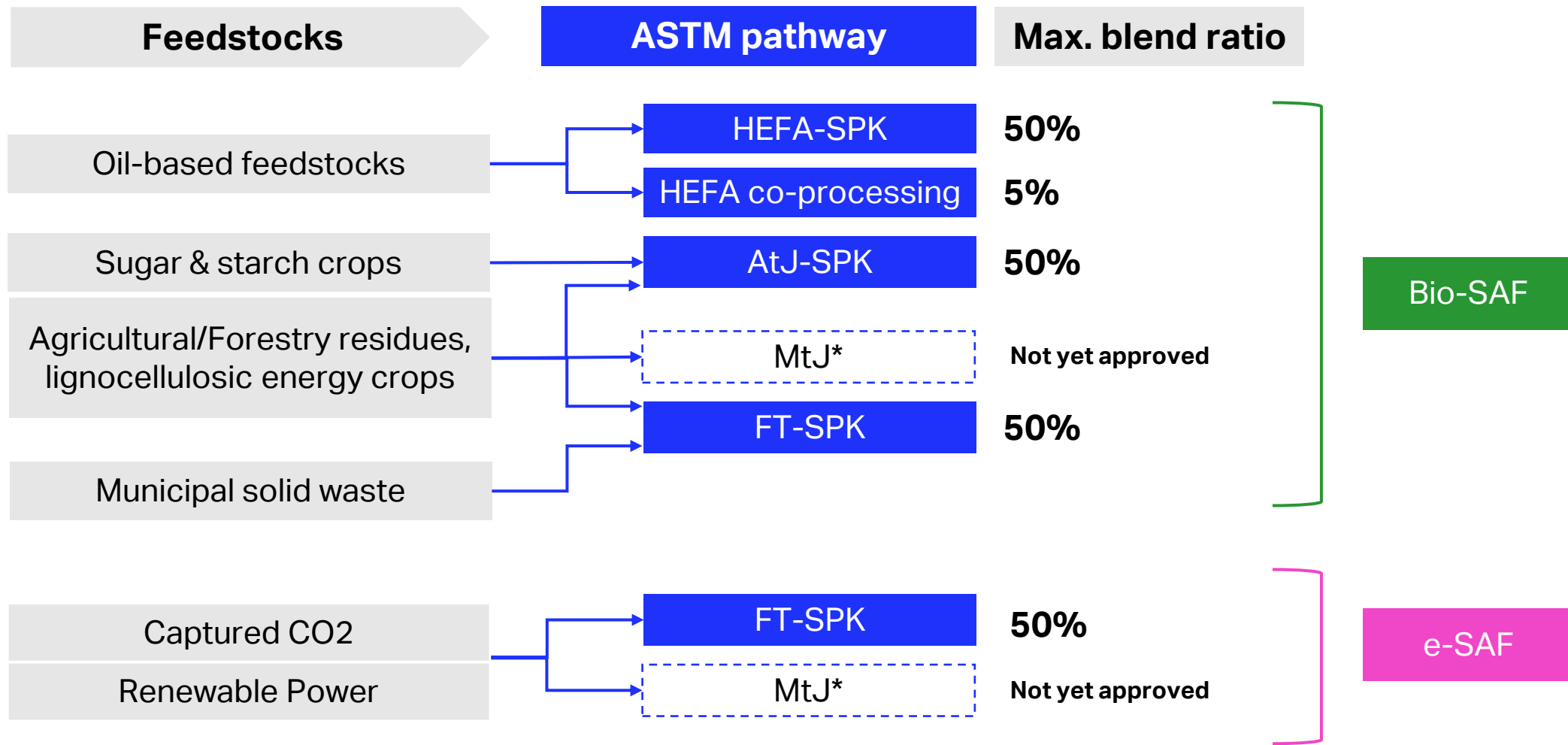
It is also aimed at keeping the benefits of global connectivity for future generations

Enablers for Aviation net-zero carbon emissions 2050



- SAF is an important **drop-in solution** for substituting conventional jet fuel in modern aircraft fleets.
- Net zero requires a **whole-economy approach**; no single industry can achieve this on its own.

SAF production routes



IATA SAF global overview

~300 SAF projects mapped globally.

160 identified projects are progressing to be online by 2030.

81%

**of renewable fuel
will be HEFA in 2030**

40

**Countries with
announced SAF
projects**

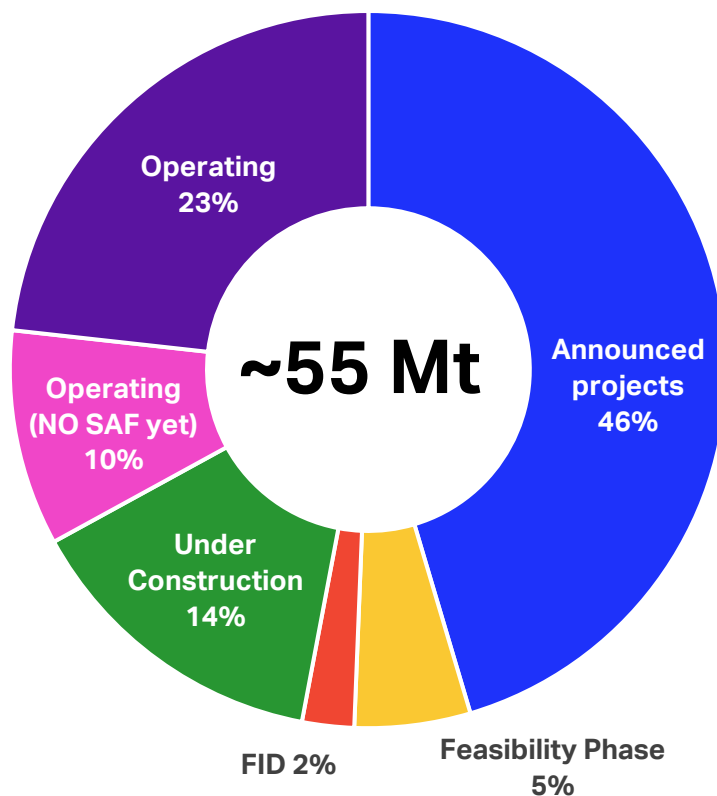
~55 Mt

**Renewable fuel
capacity* to 2030**

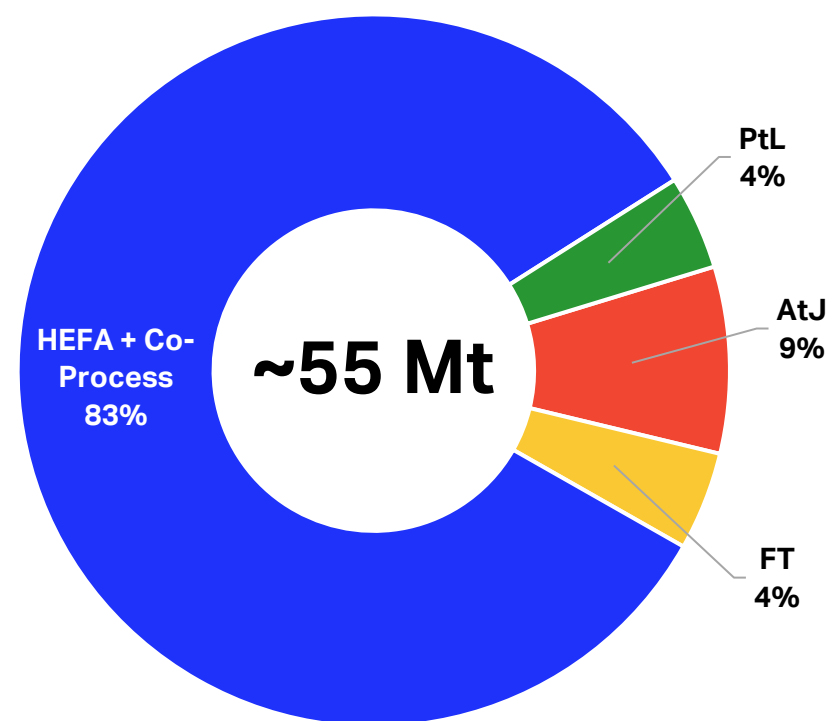
** Renewable fuel capacity of projects with current or upcoming SAF production capability*

Renewable fuels outlook to 2030

Status of SAF projects to be online in 2030, by plant capacity (Mt)

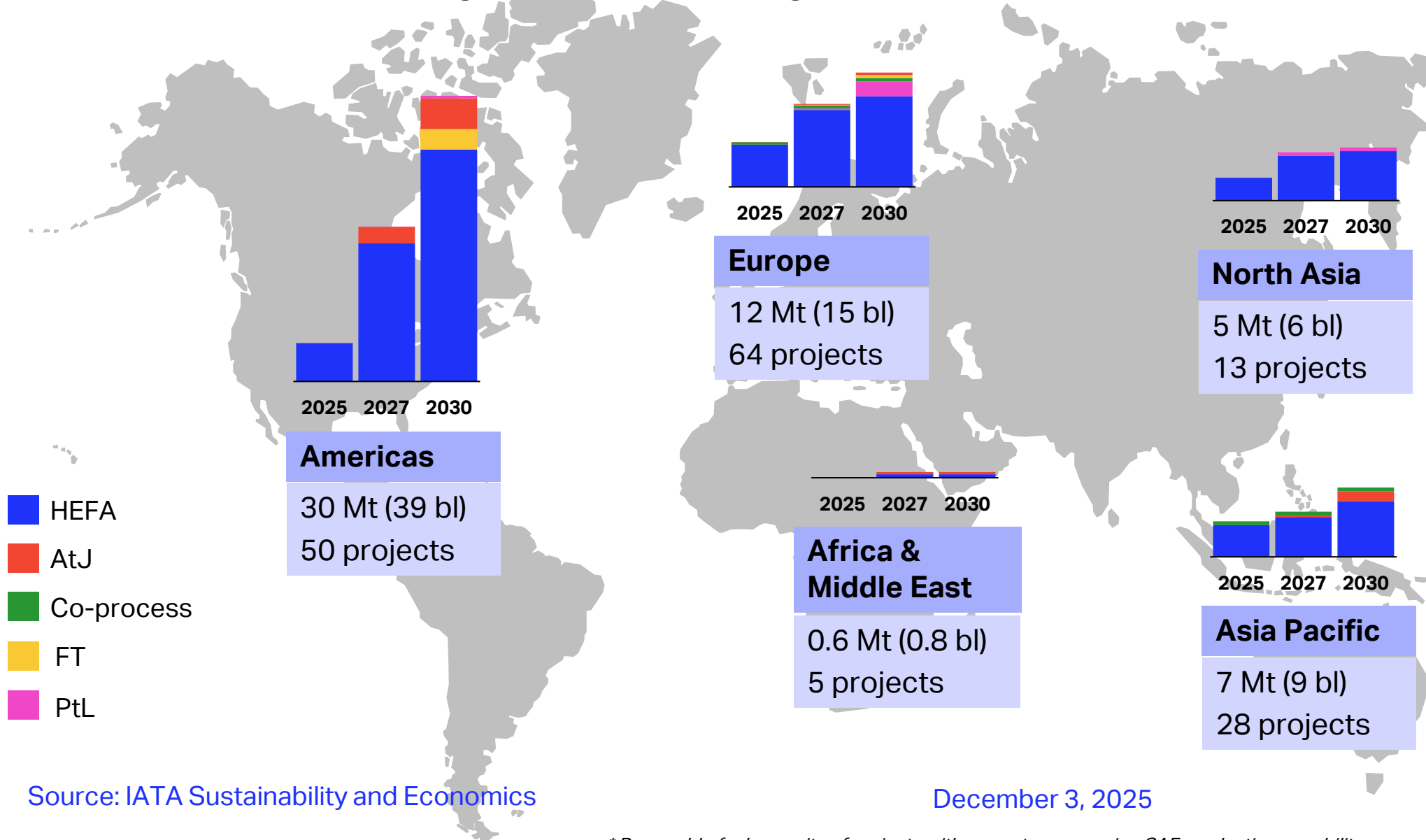


SAF technologies in 2030 (Mt)

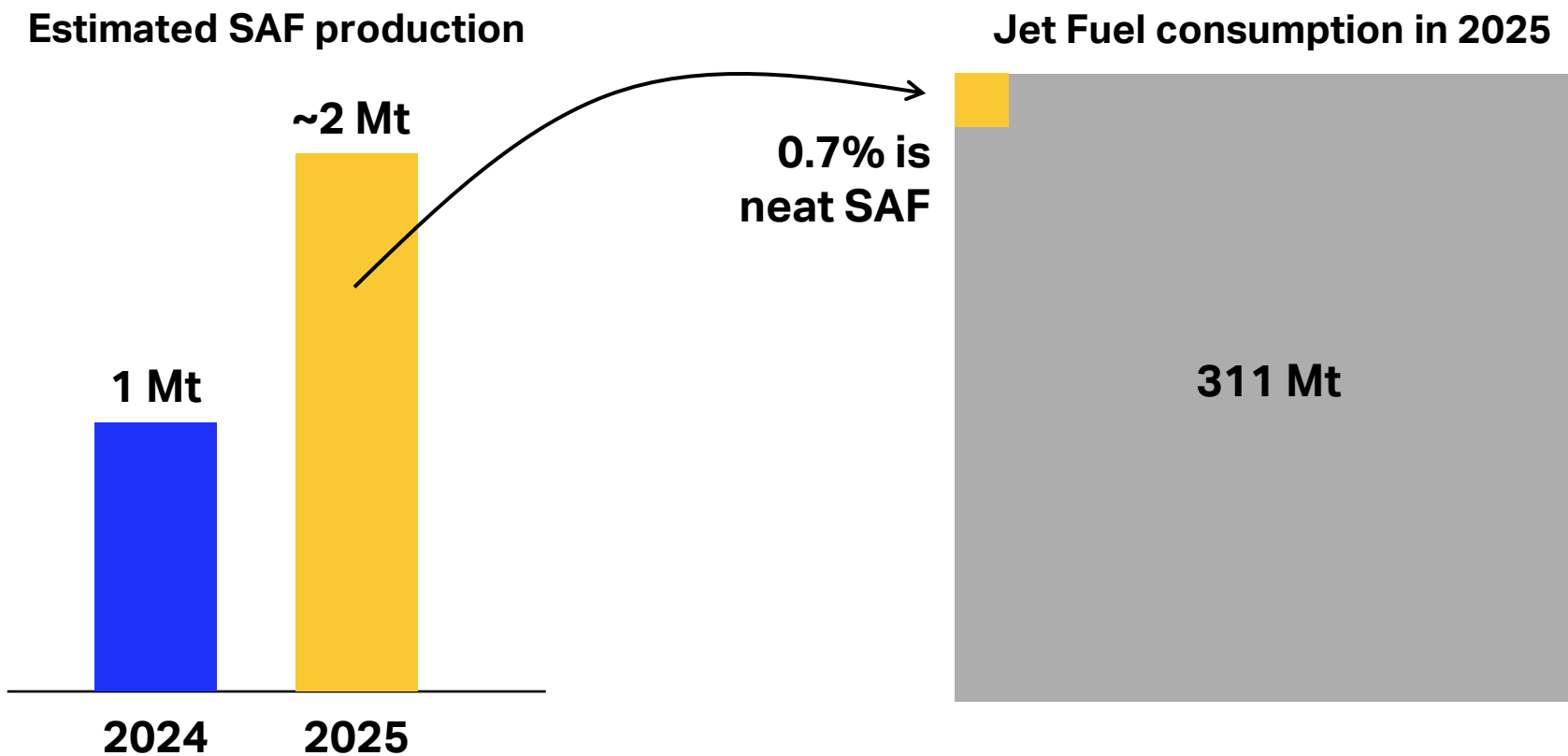


Projects and SAF pathways to 2030

Renewable fuel capacity* by region (~55 Mt or 71 bl globally by 2030)

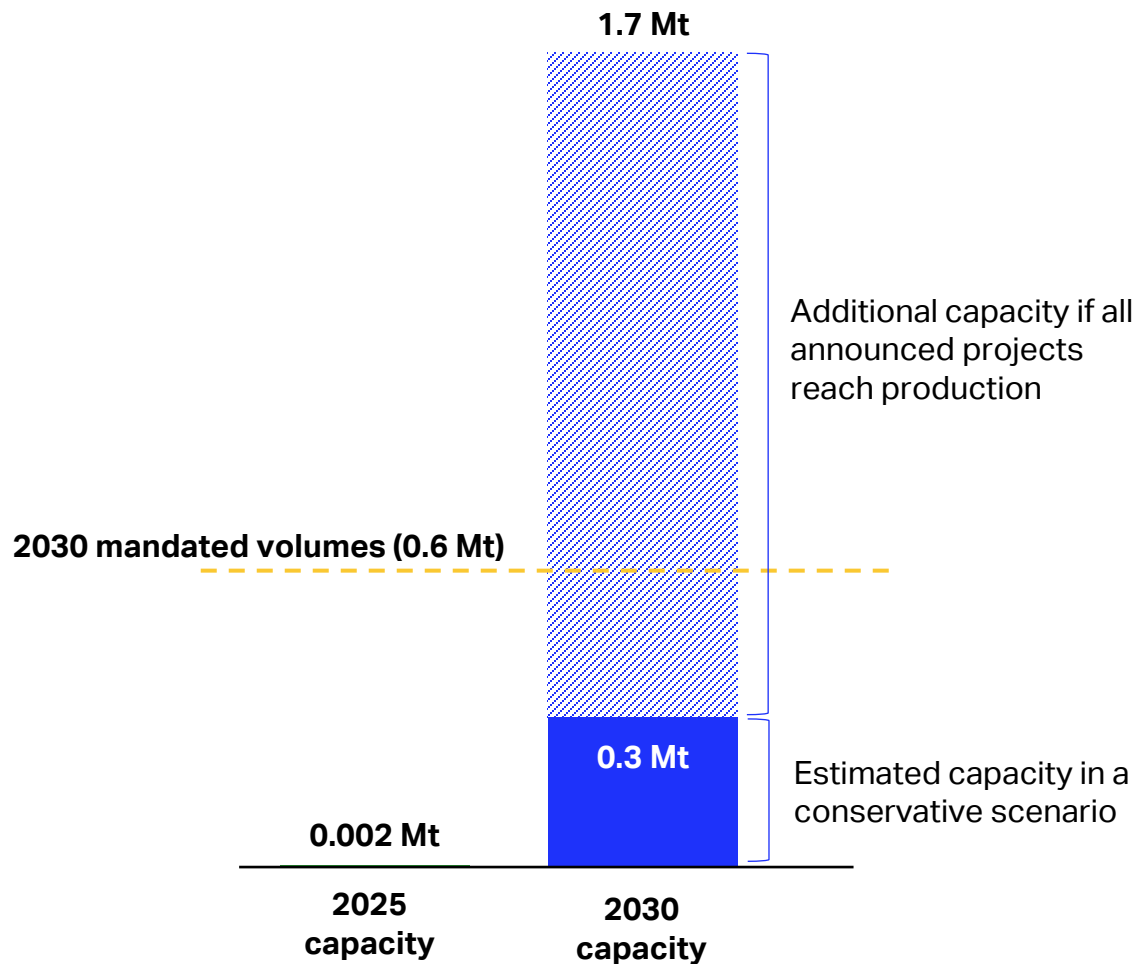


SAF production status



- **SAF production is expected to double** in 2025, but the share remains very small in the jet fuel pool.
- Around **1.2 Mt** of SAF is required to cover the **EU and UK mandates in 2025**.

Power-to-Liquid SAF outlook in 2030



- Mandated volumes in the **EU** and the **UK** will account for around **0.6 Mt of PtL in 2030**.
- **Out of 60 PtL projects** scheduled by 2030, 90% are still at the announcement stage.
- **Only 1** commercial-scale **project under construction** in the US (23 Kt capacity).

Airlines' offtake commitments

First SAF offtake commitment per airline/year, and cumulative number of announcements

Cumulative agreements





IN-DEPTH

Global Feedstock Assessment for SAF Production

Outlook to 2050

September 2025

In this global assessment of feedstock availability and SAF production potential, around 400 Mt of SAF is forecast to be possible to produce in 2050. Although this would be a major achievement, it is 100 Mt of SAF short of what will be needed in 2050. Sustainable biomass feedstocks are largely available, though access can be limited, underlining the need for e-SAF. Still, the major barrier to reaching the 500 Mt needed in 2050 is the pace of technology rollout.



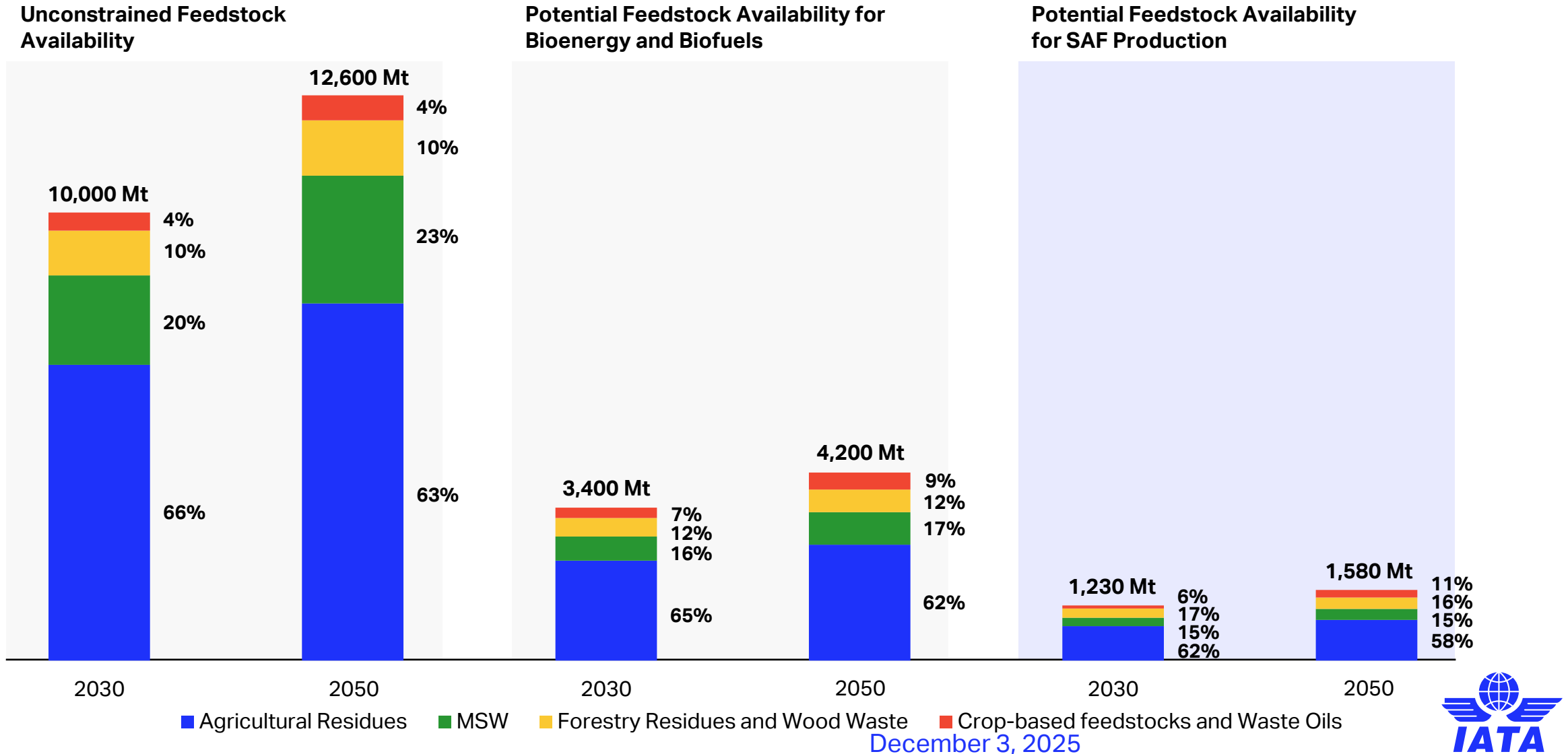
1 Global Feedstock Assessment for SAF Production

Study: Global Feedstock Assessment for SAF Production

- **Aim of the study:** demonstrate that sufficient SAF feedstock exists to enable the airline industry to achieve net zero by 2050.
- **Key finding:** SAF technology rollout is the main bottleneck to net zero, not feedstock availability.

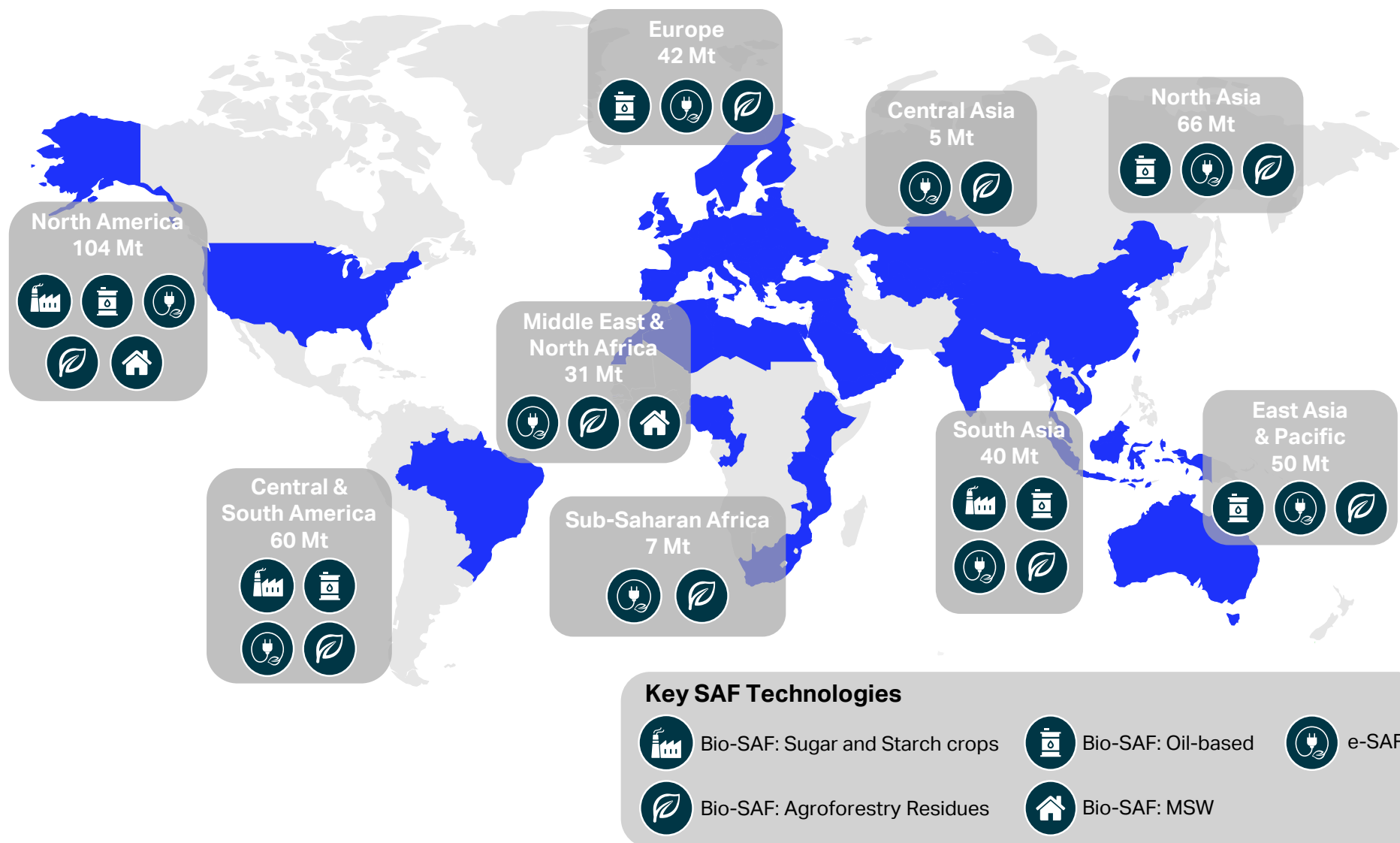


Potential availability of global biomass feedstock

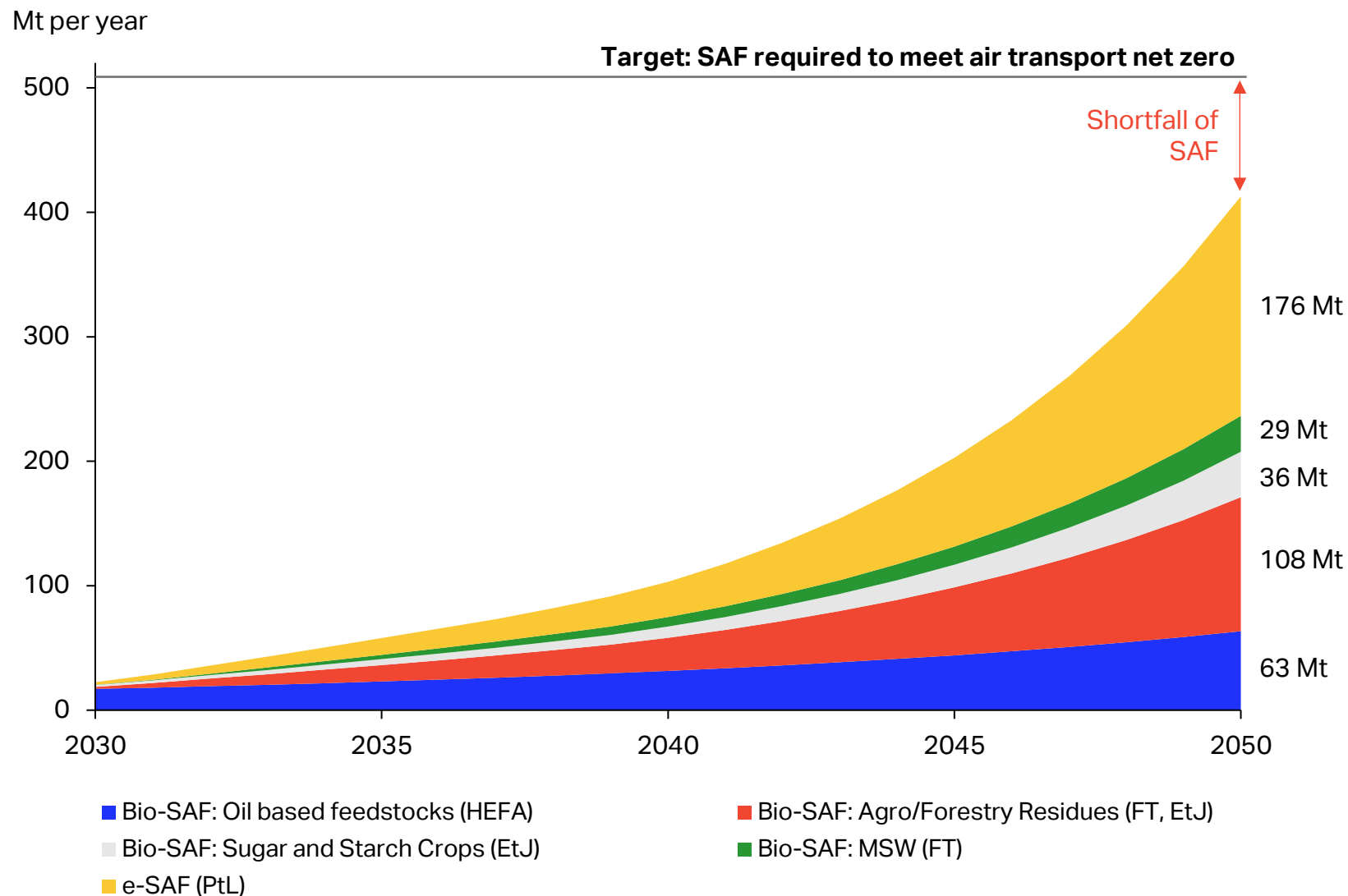


Source: IATA Sustainability and Economics, Worley Consulting

Regional SAF blueprint 2050



Estimated global SAF production potential



Key net zero enablers



Industrial partnerships to de-risk projects through supply/demand guarantees between fuel producers and airlines



Policy incentives in support of SAF that promote the uptake of new technologies through funding or price support



Building **durable trust among stakeholders**, supporting engagement, collaboration, information sharing, transparency and value sharing



Shifting value beyond solely financial to include **environmental and social value**



Development of **renewable power capacity** and **grid infrastructure**



Government and private sector support for SAF, promoting production in all regions and maximizing utilization of all feedstocks



Maximizing commercially developed production routes and feedstocks, while **supporting development of new feedstocks** and **technologies**



Strengthening **OEMs and equipment supply chains**, and fostering early collaboration with project developers



Supporting **global access to biomass feedstock** by addressing any logistics, infrastructure, and supply chain bottlenecks



Standardization, replicate designs and build in parallel

Thanks