

ARCA

GALLEY SYSTEM

A meal-service innovation
for sustainability and efficient
use of space.

a visionary concept by

AIM ALTITUDE

Each carrier box contains 16 meal-packs

an innovative galley for innovative meal service

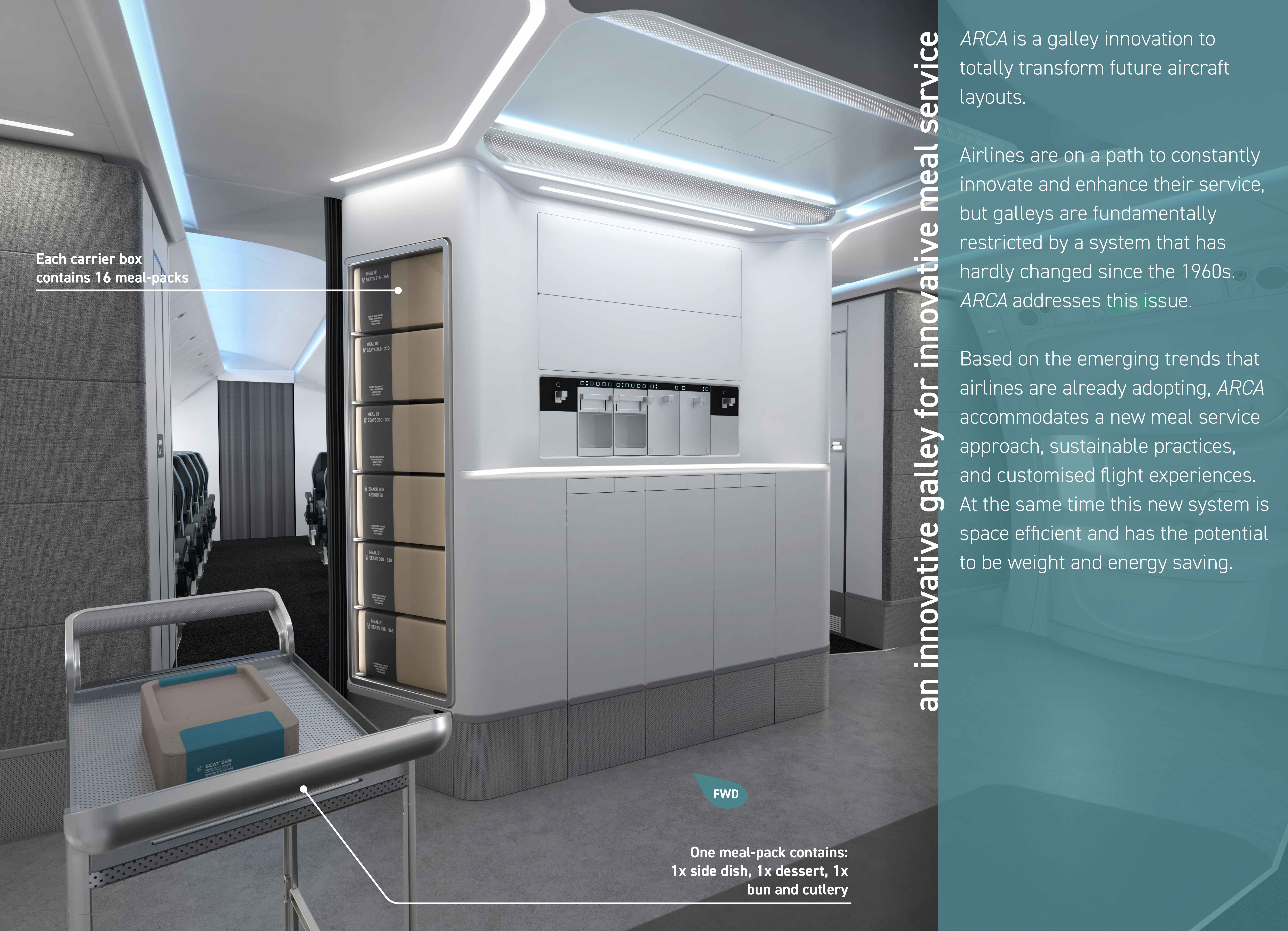
ARCA is a galley innovation to totally transform future aircraft layouts.

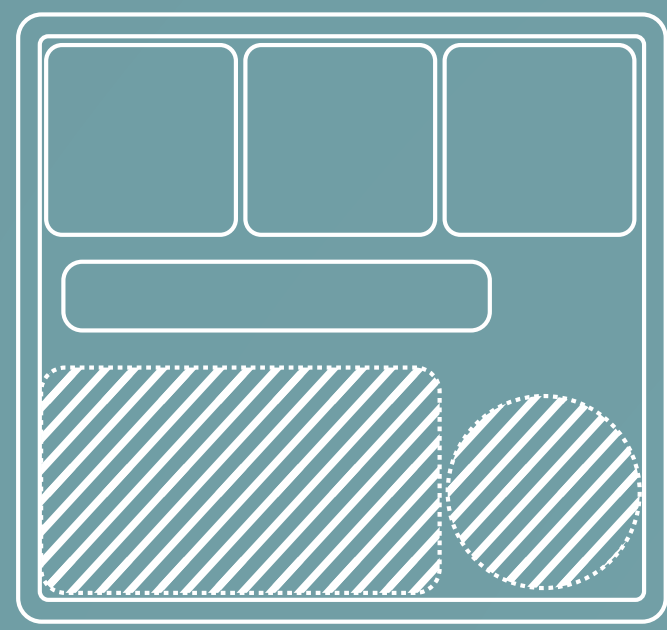
Airlines are on a path to constantly innovate and enhance their service, but galleys are fundamentally restricted by a system that has hardly changed since the 1960s. ARCA addresses this issue.

Based on the emerging trends that airlines are already adopting, ARCA accommodates a new meal service approach, sustainable practices, and customised flight experiences. At the same time this new system is space efficient and has the potential to be weight and energy saving.

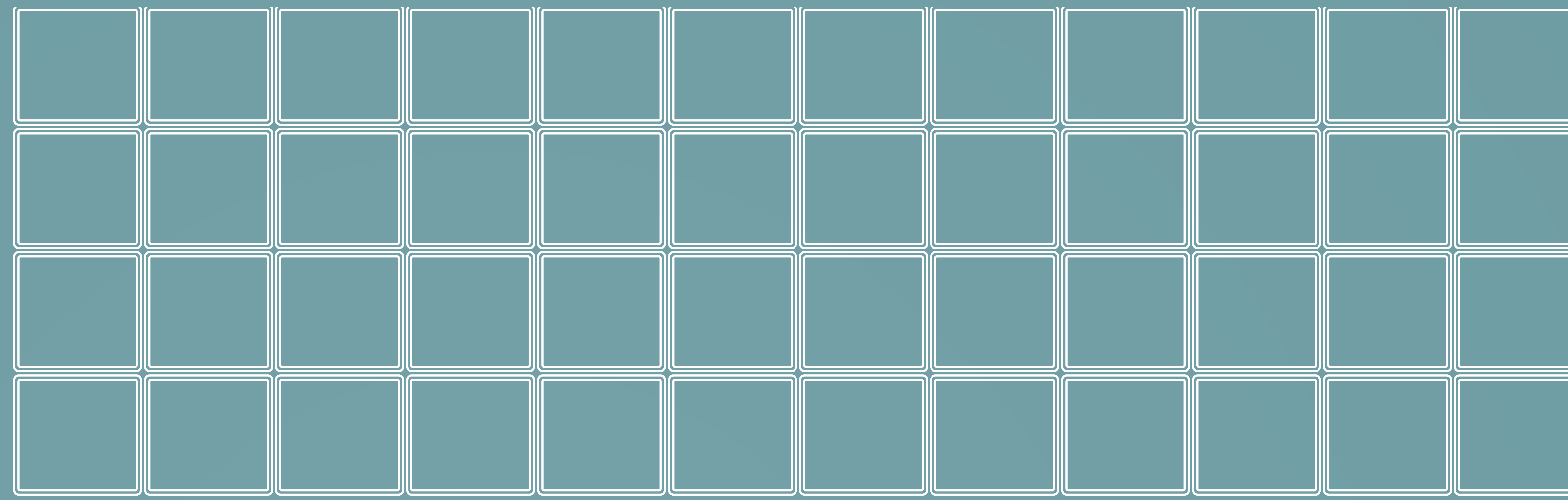
FWD

One meal-pack contains:
1x side dish, 1x dessert, 1x
bun and cutlery

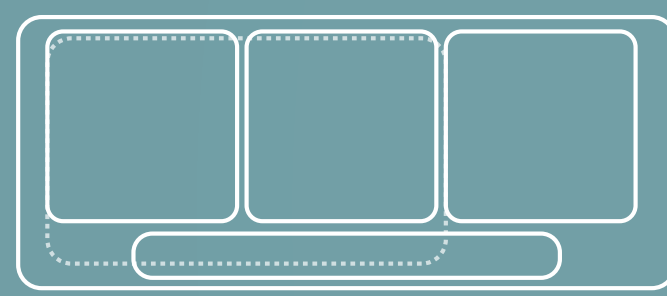




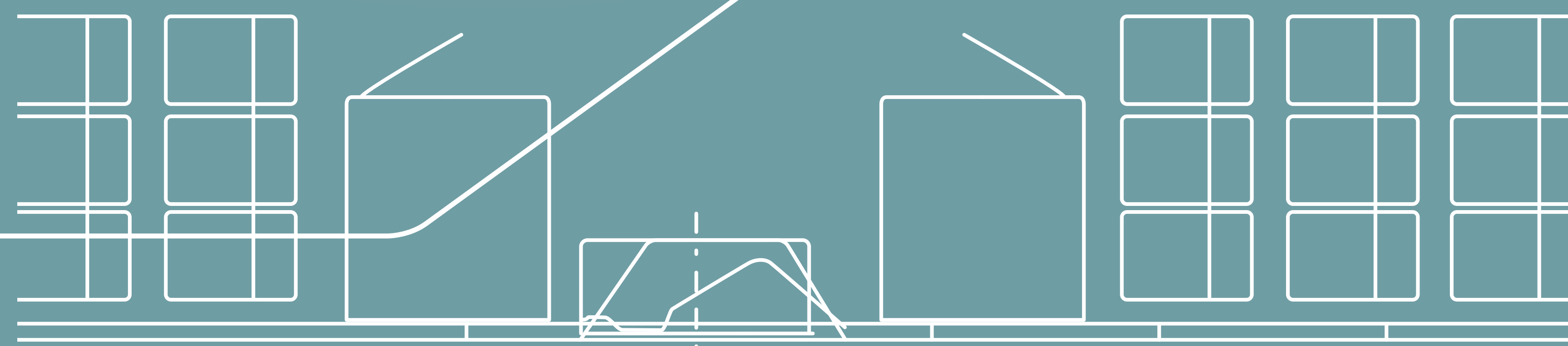
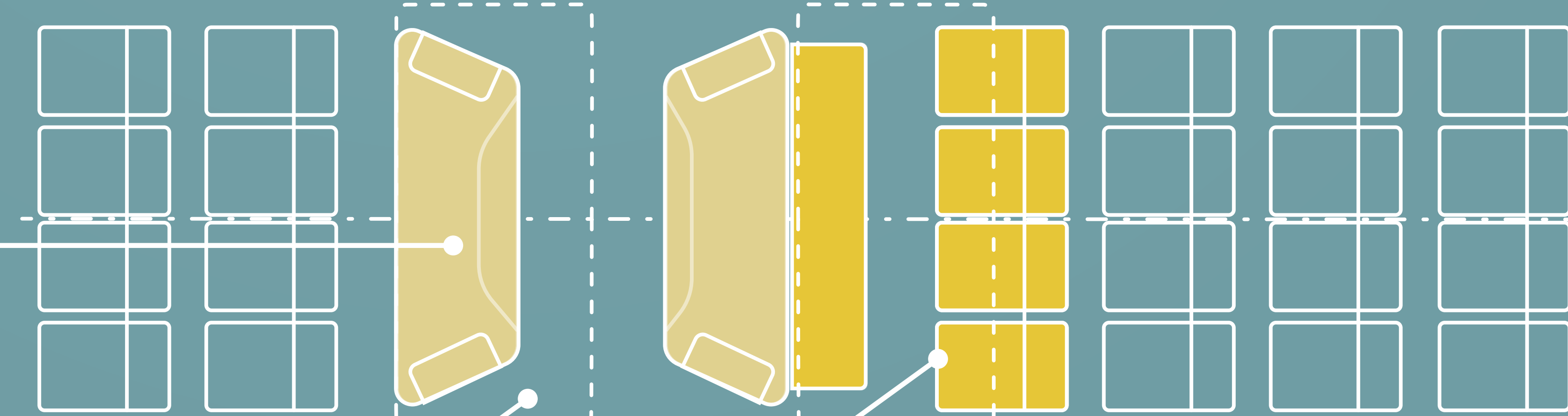
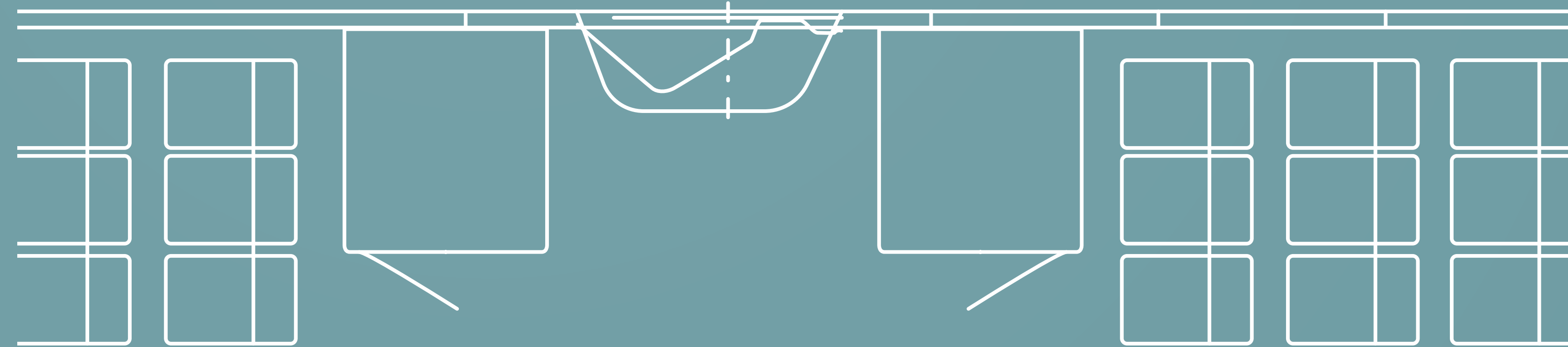
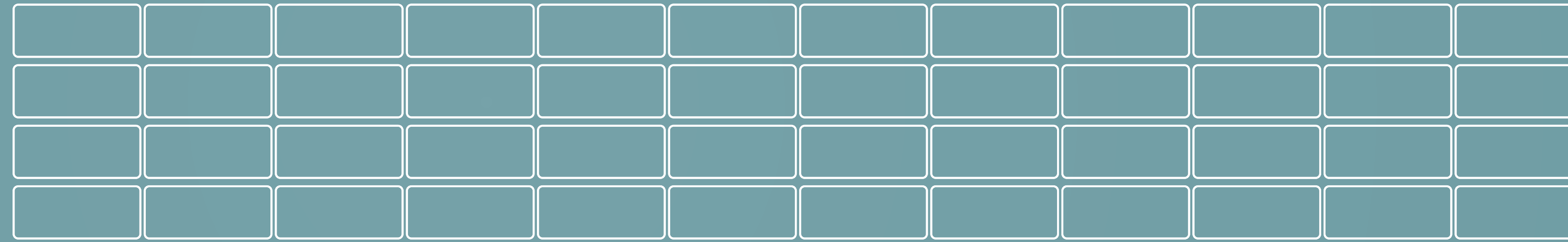
Footprint of 48 traditional meal trays with empty slots for hot meals and cups



space-saving of up to 50%



Footprint of same amount of meals packed in 48 ARCA meal-packs



ARCA galley foot print

Traditional galley foot print

Additional seating and stowage

New ARCA galley LOPA at Door 3 of wide body aircraft

new efficiencies for a new era of flight

ARCA introduces meal-packs instead of set-meal trays. This change has two clear advantages: space efficiency and waste reduction.

Currently, meal trays are loaded onto the aircraft without hot meals, which creates multiple inefficient voids in the carts. Meal-packs contain all the usual dishes and accessories: side dish, dessert, bun, and cutlery. The pack is stackable and has a much smaller footprint than a tray.

With around 300 economy passengers, this reduction gives substantial space back to the cabin, e.g. for more seats or destination features.

Meal-packs can be customised by the passenger. They benefit from receiving the foods of their choice and food-waste reduction is a likely consequence.

how it works - meal service



1. As the passenger books their flight, they also choose their seat and configure their meal.
2. The order is transferred to the catering company and a custom meal-pack is prepared.
3. All meal packs for this flight are stacked in seat order into carrier boxes. A loading rack contains all boxes for one galley and helps transport these boxes into the aircraft.
4. The carrier boxes are stored in the refrigerated compartments of the *ARCA* galley. The loading rack stays with the catering facility.
5. When meal service begins, crew retrieve the folding cart from below the meal storage area and unfold it.
6. The cart accommodates three carrier boxes (= 48 meal-packs). Hot meals are added on top of the cart.
7. Aided by a PED, crew start meal service. They retrieve the meal-pack for the seat and add the hot meal, which snaps securely into the pack.
8. The lid of the meal pack acts as a mini tray for the hot meal. No need for the passenger to directly touch the hot meal.

how it works - sustainability and recycling

ARCA enables zero landfill flights. After meal service, the carrier boxes turn into containers for waste collection. Crew can separate different recyclables, such as compostables, right at collection.

Back at the galley, these containers fit into a waste compactor that reduces the volume of both the waste and the separated recycling for efficient storage during the remainder of the flight. The empty shelving units can be used to store the excess boxes, filled with recycling. At the destination, caterers can easily identify and remove the different types of waste and recycling.



the galley

ARCA is a galley system that allows airlines to realise the full potential of their aircraft layout. It is adaptable and future-proof.

It can be further configured to work with self-service, snack offerings or as dedicated stowage to special meals. ARCA can also be adapted to single-aisle galleys.

ARCA is the galley of the future, which can be implemented now – reducing waste, customising the flight experience, and enabling a huge space saving.

Standard unit stowage

Refrigerated full-height compartment for carrier boxes, 96 meals/compartment

Drinks inserts including filtered drinking water

Bar cart compartments

Trash compactor

Folding cart compartment