

## Microarrays

# Precise temperature and rotation control designed to ensure the successful hybridization of GeneChip arrays

The Applied Biosystems™ GeneChip™ Hybridization Oven 645i automates the hybridization process for GeneChip™ arrays. The oven enables precise temperature and rotation control to help ensure successful hybridization.

### Array capacity

The oven holds up to 8 removable array carriers. Each carrier can hold up to 8 arrays, enabling up to 64 arrays to be processed simultaneously.

### Removable array carriers

The removable array carriers allow for the addition or removal of sets of arrays with minimal disruption to the hybridization cycle. Carriers are barcoded for convenient tracking purposes. Eight array carriers are included with each oven.

### Exceptional temperature performance

Each oven facilitates precise temperature control and uniformity to support consistent results across experiments for even the most demanding applications. GeneChip Hybridization Ovens meet temperature specifications direct from the factory, avoiding the need for on-site calibration checks or procedures.

### Improved ease of use

Integral locking clips secure arrays to the oven carousel. Hybridization temperature and rotation speed can be easily set using intuitive up and down arrows on the front panel. A recessed power button helps protect against adverse events. The system status panel, highly visible display, and large window provide immediate confirmation of proper operation when a user is at or near the oven.



GeneChip Hybridization Oven 645i

### Efficient use of lab space

Two ovens can be stacked to minimize space requirements.

### Safety

The oven automatically stops the rotation when the door is opened.

### Power supply range switch

The oven can be manually configured for 110 V or 220 V operation.

Performance specifications	
<b>Dimensions (W x H x D)</b>	18 x 20 x 21 in. (46 x 51 x 53 cm)
<b>Weight</b>	67 lb (30 kg)
<b>Power requirements</b>	Input voltage: <ul style="list-style-type: none"> <li>• 100–120 VAC, 5 A max. (with selector switch set to 115 VAC)</li> <li>• 220–240 VAC, 2.5 A max. (with selector switch set to 230 VAC)</li> </ul> 50 to 60 Hz Input voltage selector switch is located on the rear panel
<b>Environmental requirements</b>	Operating temperature range: 15°C to 30°C Relative humidity range: 20% to 80%, noncondensing Installation category (overvoltage) II in accordance with IEC 664 Pollution degree 2 in accordance with IEC 664 Altitude limit: 2,000 meters Storage: –25°C to 65°C; 10% to 85% relative humidity
<b>Performance</b>	Rotisserie rotation speed: 10–80 rpm, programmable to 1 rpm Oven set point programmable range: 30°C to 70°C, or ambient +5°C Oven temperature programmable to 0.1°C Time to temperature: 30 minutes from ambient to 60°C Oven temperature accuracy is ±2.0°C from 35°C to 60°C
<b>Communications</b>	9-pin RS-232 port, 9,600 baud rate; this monitors and reports oven temperature, rotisserie rotation rate, and oven status
<b>Regulatory requirements</b>	The oven conforms to the following regulatory standards, or applicable equivalents for the United States, Canada, and the European Union: <ul style="list-style-type: none"> <li>• Product safety for “Electrical Equipment for Measurement, Control, and Laboratory Use”, pollution degree 2, over-voltage category II:               <ul style="list-style-type: none"> <li>• North American standards harmonized to IEC 61010-1                   <ul style="list-style-type: none"> <li>– CAN/CSA-C22.2 No. 61010-1-04 (Canada)</li> <li>– UL 61010-1 (USA)</li> <li>– Low voltage directive 2014/35/EU                       <ul style="list-style-type: none"> <li>– EN 61010-1, general requirements</li> </ul> </li> </ul> </li> </ul> </li> <li>• Electromagnetic conformity for “Industrial, Scientific and Medical” (ISM) equipment, Group I, Class A, industrial locations:               <ul style="list-style-type: none"> <li>• EMC Directive 2014/30/EU                   <ul style="list-style-type: none"> <li>– EN 61326</li> </ul> </li> <li>• ICES-003, Industry Canada, Interference-Causing Equipment Standard, Digital Apparatus, Class A (Canada)</li> <li>• FCC Part 15 Radio Frequency Emissions for Class A Equipment (USA)</li> </ul> </li> <li>• Restriction on Hazardous Materials (RoHS)—exemption under Category 9 (RoHS Directive 2011/65/EU and amendment 2015/863)</li> <li>• Compliant with EU Directive 2012/19/EU for Waste from Electrical and Electronic Equipment (WEEE)</li> </ul>

## Ordering information

Product	Quantity	Cat. No.
GeneChip Hybridization Oven 645i (110 V or 220 V; includes 8 array carriers)	1	00-0331
Probe Array Cartridge Carriers (Red)	2	90-0356
Probe Array Cartridge Carriers (White)	2	90-0359

Learn more at [thermofisher.com/reproductivehealth](https://thermofisher.com/reproductivehealth)

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