

# **Recommended Probe Head Configurations**

# (Listed in order of best performance)

### 1. Solder-In Differential

# BANDWIDTH

- ◆ 1134A > 7 GHz
   ◆ 1132A > 5 GHz
- ♦ 1131A > 3.5 GHz
- ♦ 1130A > 1.5 GHz
- 0700-2353 910 mini-axial

lead resistors (2)

Probe either differential or single-ended signals

E2677A

Solder-in

differential

probe head

- Best solder-in connection for differential and single-ended signals
- ◆ Lowest capacitance
- ◆ Resistors must be cut to proper lengths (see user's guide)

# 2. Socketed Differential

### E2678A BANDWIDTH Socketed ♦ 1134A > 7 GHz differential ♦ 1132A > 5 GHz probe head ♦ 1131A > 3.5 GHz ♦ 1130A > 1.5 GHz Probe either differential or 0700-2348 single-ended 00 axial lead signals resistors (2)

- Best socketed connection for differential and single-ended signals
- ◆ Slightly higher capacitance than configuration #1
- Resistors must be cut to proper lengths (see user's guide)

# 3. Differential Browser

# BANDWIDTH ◆ 1134A ≈ 6 GHz ◆ 1132A > 5 GHz ◆ 1131A > 3.5 GHz ◆ 1130A > 1.5 GHz 01131-62107 91Ω resistor probe tips (2) Tab to adjust the distance

 Best hand (or probe holder) browser for differential and single-ended signals

between probe tips

E2679A

Solder-in

single-ended

Ground

probe head

Signal

◆ Similar capacitance to configuration #2

# 4. Solder-In Single-Ended

### BANDWIDTH

- 1134A ≈ 5.2 GHz
   1132A ≈ 4.8 GHz
- ◆ 1132A ≅ 4.8 GHZ ◆ 1131A > 3.5 GHz
- ♦ 1130A > 1.5 GHz
- 0700-2353 91Ω mini-axial lead resistors (1)

0700-2348 0Ω axial lead resistors (1)

E2678A

E2679A

Solder-in

single-ended

probe head

• Smallest probe head for single-ended signals

Signal

- Lowest capacitance single-ended probe head
- ◆ Resistors must be cut to proper lengths (see user's guide)

# 5. Single-Ended Browser

### BANDWIDTH

♦ 1134A ≅ 5.5 GHz

1131A = 3.5 GHz
 1132A ≅ 4.8 GHz

♦ 1131A > 3.5 GHz

♦ 1130A > 1.5 GHz

01131-62107 91Ω resistor probe tip

01130-60005 ground collar assembly for single-ended browser

E2676A

Single-ended

browser probe head

- ◆ Smallest browser for single-ended signals
- ♦ Slightly higher capacitance than configuration #4

# 6. Solder-In Differential Mid BW

### BANDWIDTH

♦ 1134A ≅ 2.9 GHz

ightharpoonup 1132A  $\cong$  2.9 GHz

♦ 1131A 

≅ 2.9 GHz

♦ 1130A > 1.5 GHz

 Best solder-in connection for better span and reach for differential and single-ended signals

◆ Slightly higher capacitance than configuration #1

han configuration #1

## E2677A

Solder-in

differential probe head

0700-2350 150Ω miniaxial lead resistors (2)

Probe either differential or singleended signals

◆ Resistors must be cut to proper lengths (see user's guide)

# 7. Solder-In Single-Ended Mid BW

### A BANDWIDTH

- ◆ 1134A ≅ 2.2 GHz
- ♦ 1132A ≅ 2.2 GHz
- 1131A ≅ 2.2 GHz
   1130A > 1.5 GHz

 $0700-2348 \Omega\Omega$  miniaxial lead resistors (1)

0700-2350 150Ω miniaxial lead resistors (1)

• Smallest solder-in connection for better span and reach for single-ended signals

Slightly higher capacitance than configuration #1

• Resistors must be cut to proper lengths (see user's guide)

# 8. Damped Wire Accessories

### BANDWIDTH

- ♦ 1134A ≅ 1.2 GHz
- 1132A ≅ 1.2 GHz
- ♦ 1131A ≅ 1.2 GHz
- ♦ 1130A ≅ 1.2 GHz
- ◆ Properly damped wires preserve fidelity at reduced BW for widely spaced differential and single-ended signals
- ◆ 01131-85202 Solder-in socket allows connection to 25 mil square pins



Probe either differential or single-ended signals

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