HB05 Wedge & Ball Bonder
Manual Wire Bonder

- **Gold-, Aluminium-, Silver- & Copper Wire**
  Wire size 17μm to 75μm, Ribbon max. 20x250μm

- **Wedge-, Ball-, Bump- & Ribbon Bonding**
  Simple change between bond modes

- **Compact Design & Intuitive Control**
  The practical design makes the bonder very easy to use

- **4” TFT Display & Multi Button**
  Fast and easy control of all bond parameters

- **Storage for 20 Parameter Sets**
  Easy setting recall for working on different applications

- **Deep & Wide Bond Access**
  Ample work space due to special bond head design

- **Electronic Wire Clamp - Up & Down Movement**
  Precise tail length control

- **Designed for Extension Kits**
  Pick & Place, Pull Tester, Video Targeting, Copper Ball Bonding
HB10 Wedge & Ball Bonder
Motorized Z- Axis

Wedge-, Ball-, Bump- & Ribbon Bonding
Simple change between bond modes

Gold-, Aluminium-, Silver- & Copper Wire
Wire size 17µm to 75µm, Ribbon max. 20x250µm

Easy Control With 6,5” Touch Panel
Access & storage of all parameters 100 sets capacity

Automatic Bond Height Adjustment
Z-axis sensor identifies touch down & sets height parameters

Deep & Wide Bond Access
Ample work space due to special bond head design

Motorized Wire Spool
For consistent looping

Electronic Wire Clamp - Up & Down Movement
Precise tail length control

KIT
Designed for Extension Kits
Pick & Place, Pull Tester, Video Targeting, Copper Ball Bonding
HB16 Wedge & Ball Bonder
Motorized Z- & Y- axis

- **Wedge-**, Ball-**, Bump- & Ribbon Bonding**
  Simple change between bond modes

- **Gold-**, Aluminium-**, Silver- & Copper Wire**
  Wire size 17µm to 75µm, Ribbon max. 20x250µm

- **Repeatable Loop Profiles**
  Motorized axis allows precise loop repetition

- **Easy Control With 6.5” Touch Panel**
  Access & storage of all parameters 100 sets capacity

- **Simple Loop Programming**
  Up to 10 steps for individual loop profiles

- **Automatic Bond Height Adjustment**
  Z-axis sensor identifies touch down & sets height parameters

- **Deep & Wide Bond Access**
  Ample work space due to special bond head design

- **Electronic Wire Clamp - Up & Down**
  Precise tail length control

- **Motorized Wire Spool**
  For consistent looping

- **KIT**
  Pick & Place, Pull Tester, Video Targeting, Copper Ball Bonding

### Wire Bonders “Made in Germany”

Relying on over 20 years wire bonding knowhow, TPT designs and manufactures a complete range of manual and semi automatic wire bonder machines.

TPT is a privately owned company, with the goal to provide the highest quality wire bonding equipment.

Based in Munich, TPT draws strength from Germany’s high technology region.

TPT bonders are used in many leading Universities, Institutes and Semiconductor, Aerospace & Medical device companies throughout the world.
HB30 Heavy Wire Bonder
Motorized Z- & Y- Axis

Aluminum & Copper Wedge Bonding
Wire size 100µm to 500µm, Ribbon with up to 300x2000µm

Easy Control With 6.5” Touch Panel
Access & storage of all parameters  100 sets capacity

High Precision Cutting Sequence
Specific wire cutting parameters prevent substrate injury

Automatic Bond Height Adjustment
Z-axis sensor identifies touch down & sets height parameters

Repeateable Loop Profiles
Motorized axis allows precise loop repetition

Deep & Wide Bond Access
Ample work space due to elevated bond head

Vacuum Stage Fixation
Optional function for high power applications
Kits & Accessories

Bond Starter Kit
All the wire & tools that you require for your first steps in bonding. Kit equipped with 25μ gold wire, 33μ alu wire, bonding tools, unplugging tools, tweezers and bonding samples.

Video Kit
Live-picture on TFT screen with targeting spot. Great support to show bonding applications and to perform picture documentation. Kit with camera, 15°-TFT and targeting device.

Pull Tester Kit

Pick & Place Kit
Perform simple Pick & Place and epoxy stamping on your bonder. Great for a quick prototype assembly. Kit with vacuum pump, die carrier, epoxy pot and tools.

Accessories
- Manual Z
- Spotlight Targeting
- Copper Ball Bonding Kit
- Wire Spool Holder

Heater Stages
- Ø 60mm
- Ø 90mm
- rotatable Ø 90mm
- 100mm x 100mm
- 100mm x 150mm
## Wire Bonder

<table>
<thead>
<tr>
<th>Bonder</th>
<th>HB05</th>
<th>HB10</th>
<th>HB16</th>
<th>HB30</th>
</tr>
</thead>
<tbody>
<tr>
<td>Wire Size</td>
<td>17-75μm</td>
<td>17-75μm</td>
<td>17-75μm</td>
<td>100-500μm</td>
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<tr>
<td>Ribbon max.</td>
<td>25x250μm</td>
<td>25x250μm</td>
<td>25x250μm</td>
<td>300x2000μm</td>
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<tr>
<td>Type</td>
<td>Manual</td>
<td>Semi-automatic</td>
<td>Semi-automatic</td>
<td>Semi-automatic</td>
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<tr>
<td>Auto Height Setup</td>
<td>-</td>
<td>Yes</td>
<td>Yes</td>
<td>Yes</td>
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<tr>
<td>Loop Control</td>
<td>-</td>
<td>Height Control</td>
<td>Loop Profile</td>
<td>Loop Profile</td>
</tr>
<tr>
<td>Control Panel</td>
<td>4” TFT</td>
<td>6,5” Touch Screen</td>
<td>6,5” Touch Screen</td>
<td>6,5” Touch Screen</td>
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<tr>
<td>Program Storage</td>
<td>20</td>
<td>100</td>
<td>100</td>
<td>100</td>
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<tr>
<td>Ultrasonic Power</td>
<td>10 Watt</td>
<td>10 Watt</td>
<td>10 Watt</td>
<td>20 Watt</td>
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<tr>
<td>max. Bond Force</td>
<td>130 cN</td>
<td>150 cN</td>
<td>150 cN</td>
<td>1800 cN</td>
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<tr>
<td>Bond Time</td>
<td>0-1 sec.</td>
<td>0-10 sec.</td>
<td>0-10 sec.</td>
<td>0-10 sec.</td>
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<tr>
<td>Ultrasonic System</td>
<td>63,3 kHz</td>
<td>63,3 kHz</td>
<td>63,3 kHz</td>
<td>60 kHz</td>
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<tr>
<td>Wire Clamp</td>
<td>motorized</td>
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<tr>
<td>Wire Termination</td>
<td>clamp</td>
<td>clamp</td>
<td>clamp / table tear</td>
<td>wire cutting</td>
</tr>
<tr>
<td>Wirespool Motion</td>
<td>manual 2”</td>
<td>motorized 2”</td>
<td>motorized 2”</td>
<td>manual 4”</td>
</tr>
<tr>
<td>Dimensions (LxWxH)</td>
<td>550x450x250mm</td>
<td>680x640x500mm</td>
<td>680x640x500mm</td>
<td>680x640x570mm</td>
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<tr>
<td>Weight</td>
<td>29kg</td>
<td>42kg</td>
<td>42kg</td>
<td>50kg</td>
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<td>Electrical Requirements</td>
<td>100-240V / 6A max.</td>
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<td>Industry Standard</td>
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<td>Pick &amp; Place Option</td>
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<td>Yes</td>
<td>Yes</td>
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<td>Pull Tester Option</td>
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<td>Copper Bonding Option</td>
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<td>Video Target Option</td>
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<tr>
<td>Extended Force Option</td>
<td>-</td>
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<td>-</td>
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Specifications are subject to change without prior notice.