

How to learn tool lengths manually on an HDS

The screenshot displays the OSAI ProcessController software interface. The 'Tool Offset Preset' dialog box is highlighted with a green border and contains the following fields:

- Reference Axis: X, Y, Z (Z is selected with a red circle and an asterisk icon).
- Offset Number: 0
- Tool Tip Position: 0.000
- Buttons: OK, Cancel

Four callout boxes provide instructions:

- ALWAYS select Z axis as the reference axis!** (points to the Z axis selection)
- The Offset Number should be the same as the tool number.** (points to the Offset Number field)
- Leave Tool Tip Position as 0 as long as the tip of the cutter is at the table surface.** (points to the Tool Tip Position field)
- Click 'OK' and repeat for every tool.** (points to the OK button)

The background shows the 'TOOL MENU' and 'IDENTIFY TOOL' screens. The 'TOOL MENU' includes fields for TOOL NO (0), IDENTIFY TOOL (0), and SPE (0). The 'IDENTIFY TOOL' screen shows speed settings at 100.0%.

On the right, the 'Work' table shows coordinates:

Work		ORIGIN NO	
X	19.955	X	0
Y	5.021	Y	0
Z	-0.000	Z	0

Below the 'Work' table, the 'T.OFFSET' is set to 1, and the offsets are:

- Dia offset: 0.000
- X offset: 0.000
- Y offset: 0.000
- Z offset: 0.000

The bottom of the screen features a 'Production Screen' with 'HOLD' and 'RESET' buttons, and a 'Menu Screens' panel with 'OFFSETS', 'I/O', and 'MAIN' buttons. The status bar at the bottom shows 'Select', 'Set Up', 'Origin/Tool', 'Part Program', and 'Utility' options, along with a Windows taskbar at the very bottom.