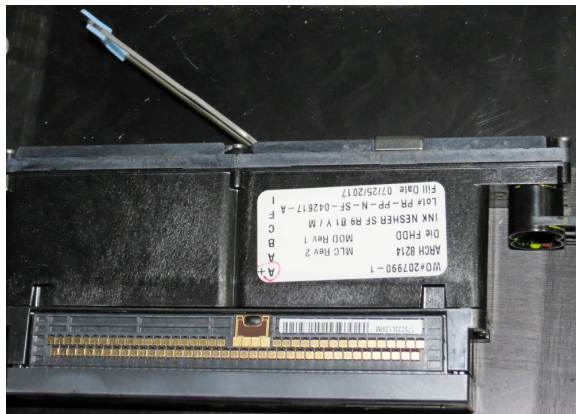




## Replacing a Print Head

CSR Level:	CSRA	
Part Numbers:		
	Sales Part Numbers:	Engineering Part Numbers:
	Bonding agent: CQ010A	Bonding agent: CQ010-30001
	Yellow/magenta: CQ011A	Yellow/magenta: CQ011-30001
	Cyan/black: CQ012A	Cyan/black: CQ012-30001
Frequency:	As needed	
Document ID:	c05942224	
Revision:	Rev. D	
Date:	08-Aug-2019	



Required personnel:	1
Required time:	10-30 minutes
Required tools:	none

**Caution:**

All personnel who need to operate and maintain the C500 press should work in strict compliance with the safety precautions, warnings, and operating instructions provided in "*HP PageWide C500 Press Essential Health and Safety Instructions*" (available in Knowledge Zone, document ID: [c05472179](#)).


**Important:**

It is mandatory to flush all new print heads with ink at the flushing station before installing them on the press.

Print heads can be installed up to **7 days** after flushing. After 7 days, the print head must be flushed again before it is installed. Similarly, print heads that have been removed from the press can be re-installed up to 7 days after removal. After 7 days, the print head must be flushed before it is re-installed.



## Replacement Procedure

1. From the main screen in the C500 application, tap the icon  **Print Heads Manager** on the widget bar at the bottom of the screen to open the Print Heads Manager.
2. Select the print head(s) to replace by tapping them once in the diagram (the selected print heads are listed to the right of the diagram).

**Print Heads Manager**

Select any print head with a single click/tap. Click or tap again to deselect it. All selected print heads are listed on the right. Press REPLACE to start the replacement process.

**Print Heads**

**Selected Print Heads:**

- 6/#3  
1184795
- 4/#7  
1184630

**Legend:**

- Selected
- Quality Issue
- Predicted Failure
- Failed

**Calibrate** **Replace**

3. In the wizard, tap **Start**. This initiates the process that prepares the press for print head replacement.

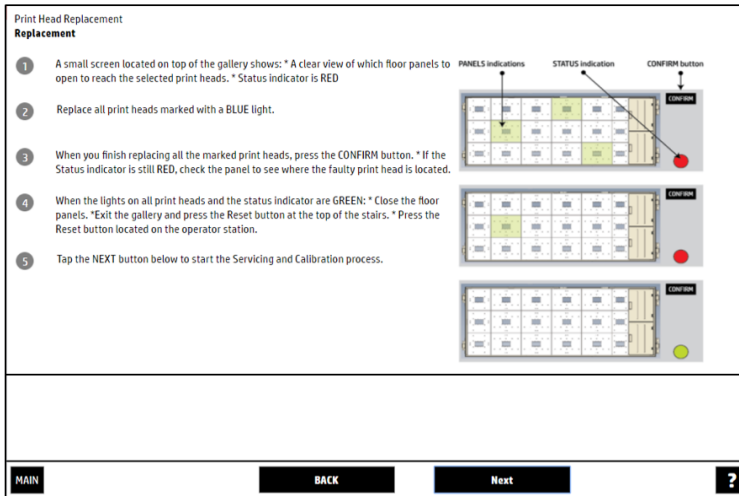
**Print Head Replacement**

**INITIATION**

Tap the **START** button to initiate the process. Several subsystem operations begin automatically. When completed, you will be instructed to go to the press gallery to replace the selected print heads.

**MAIN** **Start** **?**

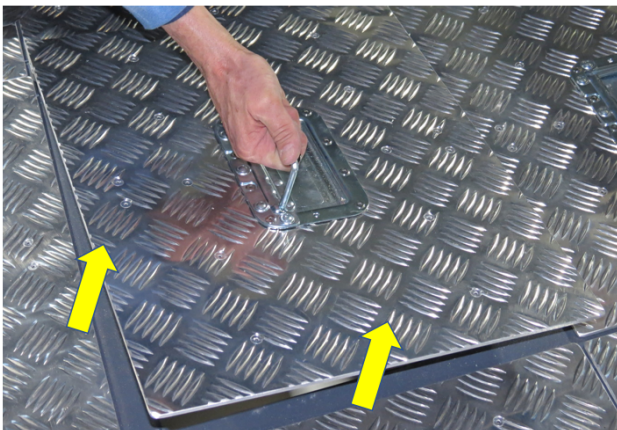
- After the wizard indicates that the press is ready, tap **Next**. Instructions for locating the faulty print head are displayed in the machine application.



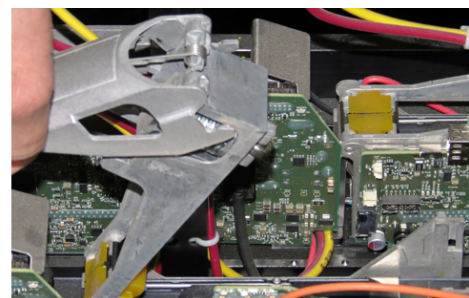
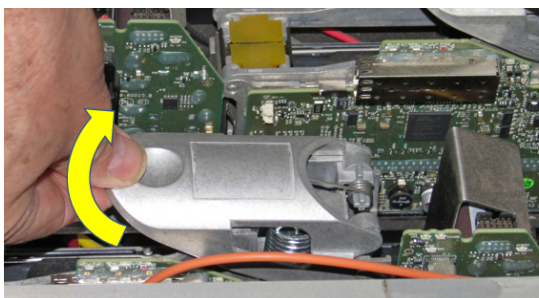
**Note:**

Selecting the print heads in the Print Heads Manager activates the blue LED on the relevant Dogmatix boards. This makes it easier to identify the print heads to be replaced when you are up in the gallery.

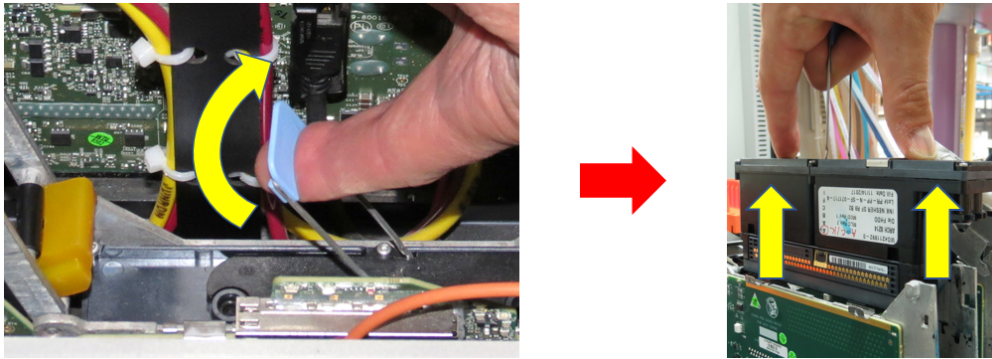
- Climb up to the gallery.
- Open the floor panel above the faulty print head.



- Find the faulty print head, as indicated by the blue LED.
- Open the securing clamp by lifting the handle.

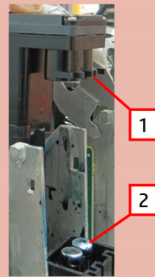
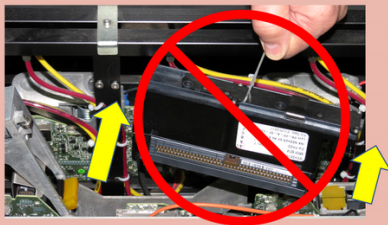


9. Lift the handle for the print head and remove the print head from the ink beam.



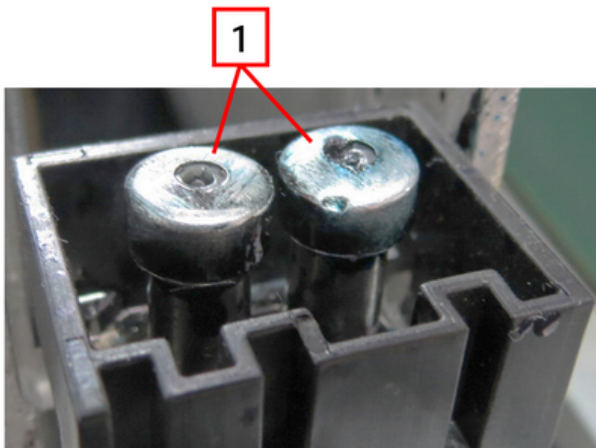
**Caution:**

Be sure to pull the print head straight up out of its pocket. Pulling the print head at an angle can damage the septums!



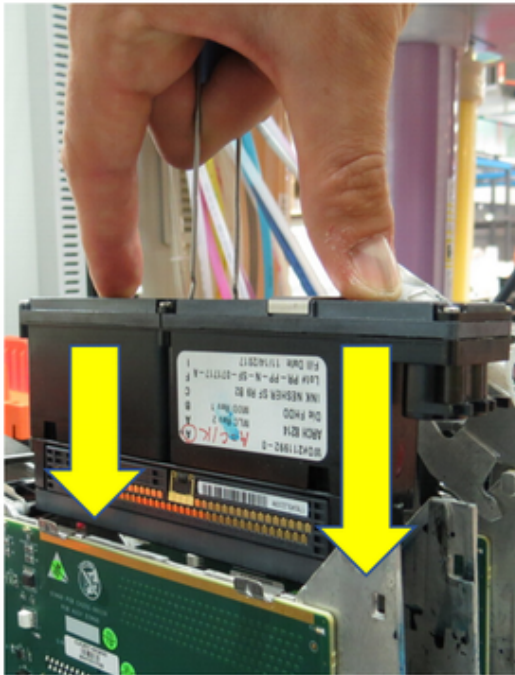
1	Needles on print head
2	Septums

10. Inspect the septums for signs of ink leakage. If the cap of the septum is misaligned, replace the septum.

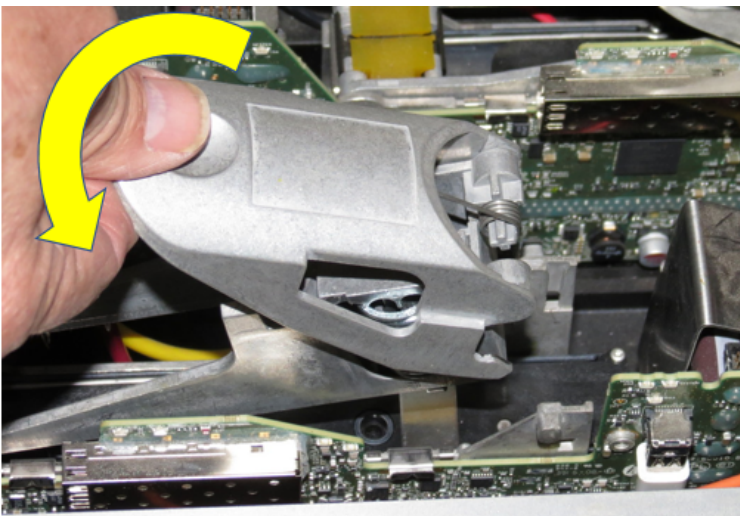


1	Septums
2	Example of septum with misaligned cap

11. Carefully insert the new print head in its pocket. Make sure to insert the print head parallel to the pocket and to align the needles properly with the septums.



12. Close the securing clamp.



13. Verify that the yellow rubber insert on top of the pen pocket is in its proper place, as shown below.

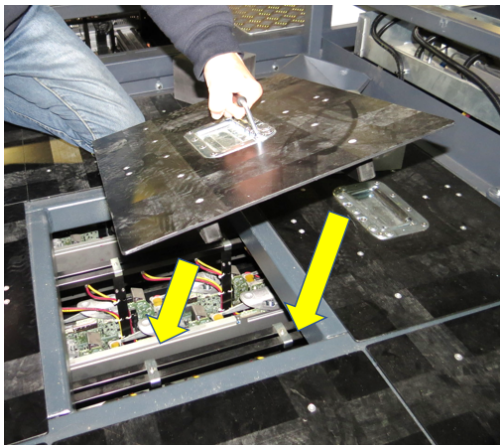


**Caution:**

If the rubber insert is out of position, the pen pocket will not hold the print head securely in place, which can lead to data errors.



14. Close the floor panel.



**Important:**

When replacing multiple print heads, it is strongly recommended to replace them one at a time. In other words, after removing one print head, insert the new print head before moving on to remove the next faulty print head.

15. Exit the gallery. Make sure to close the gate as you leave to engage the safety interlock.

16. Press the **Reset** button at the top of the stairs and return to the operator console.



17. Press the **Reset** button on the main operator console.

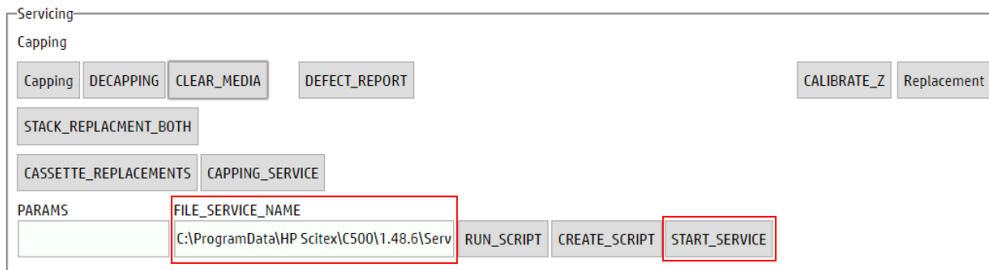


1	Reset button
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**Note:**  
Alternatively, press the **Reset** button on the secondary operator console.

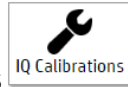
## After Replacement

1. Perform **Init3** servicing immediately after replacing print heads (regardless of whether the print heads were flushed or not):
  - a. Tap **Servicing**.
  - b. In the File Service Name field, enter the path to the service routine:  
**C:\ProgramData\HP Scitex\C500\[SW\_ver]\Service\ServiceInit3.psv**
  - c. Tap **Start Service**.



2. Run silent MND and line shift calibration (*requires R&D mode*):

a. Tap **RnD**.



b. In the widget bar, tap **IQ Calibrations**.

c. From the Calibration Type dropdown list, select **Silent Missing Nozzles Detection**.

d. Select the print quality, print height, substrate type and dimensions.

e. Tap **Set**.

f. Tap **Calibration**.

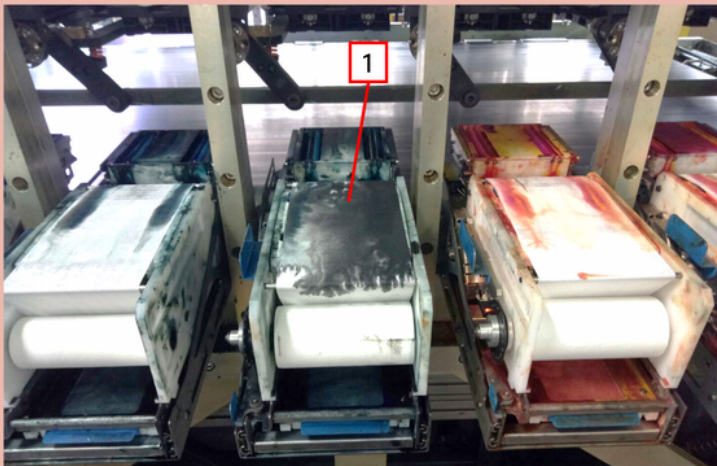
g. From the Calibration Type dropdown list, select **Fine Alignment**.

h. Tap **Calibration**.

CALIBRATION_TYPE	Print Quality	Print Height
Silent Missing Nozzle: ▾	Standard ▾	2
PRINT_SUBSTRATE	Width	Height
DirectDrive B Flute ▾	1400	1000
SET	Calibration	

**Caution:**

After every print head replacement, it is strongly recommended to inspect the press **after 10 minutes** of production for signs of ink leakages around the ink beams and on the web wipe cassette.



1 Sign of ink leakage from ink beam onto web wipe cassette

**Important:**

All print heads removed from the C500 must be returned to HP for analysis. For detailed information about the return process, see the document, **Print Head Return Process** (document ID: c05942230), which is available on Knowledge Zone.