Activating a new leg while on a vector to intercept an airway, or the method

Prior to departing IFR from Tucson’s Ryan Field, your IFR clearance is:
Cleared to Phoenix (KPHX) via direct ALMON, V105 Phoenix PXR

After takeoff, departure control clears you to fly heading 320° and intercept V105.

V105 starts behind you, at the Tucson VOR (TUS). You’ll need that to define V105.
Insert TUS in your flight plan, prior ALMON. (Highlight ALMON and enter TUS).
The new flight plan will take you back to TUS, with TUS as the TO waypoint, and then V105 to ALMON.

To change that:
Highlight ALMON, the next fix on V105, and . . .

Press DCT DCT and ENT

Pressing activates the TUS to ALMON leg of your flight plan, (V105). NOTE V105 is now in magenta. ALMON is now your TO waypoint (FROM TUS).

Place 289° in the CDI/HSI and intercept V105
**Inserting a User Waypoint**

**SITUATION:** Your route of flight includes Stanfield VOR (TFD), then the Victor Airway to Gila Bend and then onward.

Approaching TFD, ATC clears you direct TFD, then the TFD 240° radial, to the GBN 100° radial, GBN, flight plan route.

Press the **FPL** key and activate the cursor by pressing the small knob (marked “PUSH CRSR”).

Place the cursor over the fix you want your user waypoint to precede,  

Turn the small knob one click to the right, activating the WAYPOINT INFORMATION screen.
Using the small and LARGBE knobs, name the new point something unique, such as “GBN1” and press \( \text{ENT} \).

Since the GPS has never heard of GBN1, a small screen opens asking if you would like to create a new user waypoint?
Sure, you want to do that, so press \( \text{ENT} \).

Move the cursor over the top \( \text{REF WPT} \) box, and if TFD isn’t there, put it there and press \( \text{ENT} \).
NOTE: The cursor is advanced by pressing \( \text{ENT} \) throughout this sequence of events.

Enter 240.0 in the RAD box press \( \text{FPL} \).
Enter GBN in bottom \( \text{REF WPT} \) box \& \( \text{(ENT)} \). Enter 100.0 in GBN’s RAD box \( \text{and press ENT} \). The cursor will advance to the LAT/LONG position. Press \( \text{ENT} \) again. This will advance the cursor, highlighting

Again, press the \( \text{ENT} \) key.

The Flight Plan and map will now resemble:
CREATING A USER WAYPOINT USING LATITUDE & LONGITUDE

We could have created GBN1 using a desired LAT/LONG instead of two different radials. Press \textbf{ENT} to advance the cursor to the “Position Box”

Use the small and LARGE knobs to modify the Latitude and Longitude.

Press \textbf{ENT} when finished.

This highlights \textbf{Create?}

Press \textbf{ENT} to create GBN1 based on a LATITUDE/LONGITUDE.
**Holding**

Enroute to Phoenix, approaching the Stanfield VOR (TFD), *ATC instructs:*

*Hold south on the Stanfield 180° Radial*

Press [OBS] before you reach TFD. This will stop Waypoint Sequencing.

Notice that "[OBS]" appears over the key.

Crossing TFD, start a right turn and put the holding pattern inbound course – 360° – in your CDI/HIS. A line is now drawn from TFD on that radial.
When cleared on course after crossing TFD, press the key. Automatic waypoint sequencing is active.

*Note:*
*Pressing the **OBS** key inhibits the **CDI** key.*
**Other cool uses for the OBS key**

As you approach your landing airport, you are cleared for a straight-in to runway 04.

Press the OBS key and put 040 in the CDI/HIS. This draws a line from the end of runway 04 and out to infinity. This is the straight-in final approach course.