

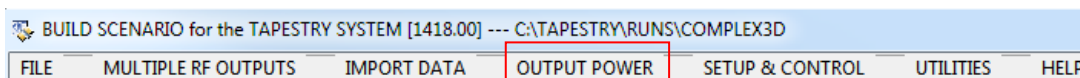
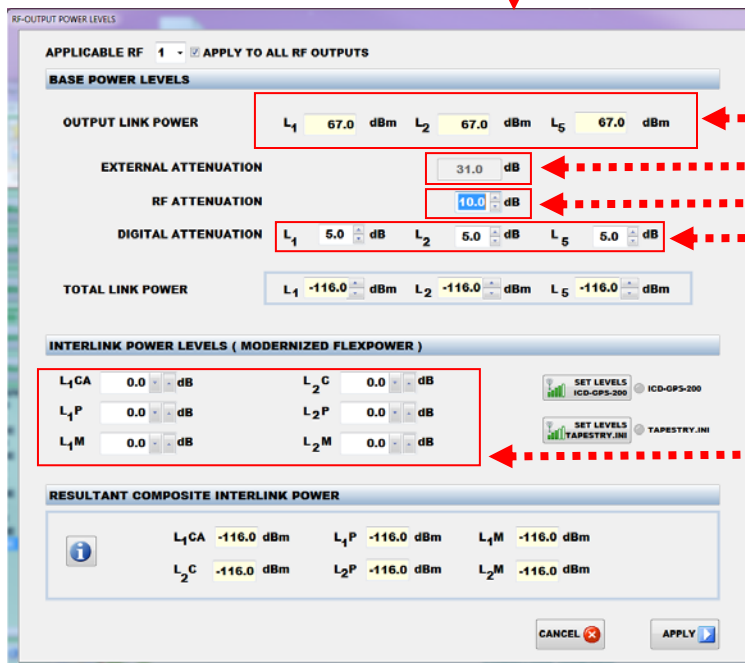


SETTING THE OUTPUT POWER

Specifying the Absolute Output Power Levels to some predetermined reference-point (for example our N-Type RF output connector) combines four effects:

- Base output power resulting from digital processing: This power component is normalized using our [Calibration Procedure](#). *Typically it is about - 65 dBm.*
- The Nominal [Channelized Link Power](#) specified for the Scenario. This is the apriori power attenuation applied to each of the 12 or 16 tracking channels. *Typically this is + 10 dB..*
- [Flex-Power](#) reflects the CODE power level differences between and within the various frequency links. This only applies to a MODERNIZED system. *For a LEGACY system these should all be 0.*

These effects are accessed from the **Build Scenario** main pull down **OUTPUT POWER**:

RF-OUTPUT POWER LEVELS

APPLICABLE RF: 1 ☒ APPLY TO ALL RF OUTPUTS

BASE POWER LEVELS

OUTPUT LINK POWER: L₁ 67.0 dBm L₂ 67.0 dBm L₅ 67.0 dBm

EXTERNAL ATTENUATION: 31.0 dB

RF ATTENUATION: 10.0 dB

DIGITAL ATTENUATION: L₁ 5.0 dB L₂ 5.0 dB L₅ 5.0 dB

TOTAL LINK POWER: L₁ -116.0 dBm L₂ -116.0 dBm L₅ -116.0 dBm

INTERLINK POWER LEVELS (MODERNIZED FLEXPWR)

L₁CA 0.0 dB L₂C 0.0 dB
 L₁P 0.0 dB L₂P 0.0 dB
 L₁M 0.0 dB L₂M 0.0 dB

RESULTANT COMPOSITE INTERLINK POWER

L₁CA -116.0 dBm L₁P -116.0 dBm L₁M -116.0 dBm
 L₂C -116.0 dBm L₂P -116.0 dBm L₂M -116.0 dBm

CANCEL APPLY

CALIBRATION VALUES. THESE ARE THE VALUES ON THE YELLOW CALIBRATION STICKER AFFIXED TO YOUR UNIT. THIS IS THE OUTPUT POWER AT OUR N CONNECTOR WITH 0 ATTENUATION

APPLIED IN-LINE ATTENUATION PAD.

ANALOG ATTENUATOR APPLIES TO ALL CHANNELS. THIS IS THE RF-GAIN SHOWN ON THE RUN SCENARIO MAIN SCREEN.

APRIORI DIGITAL ATTENUATOR APPLIES TO INDIVIDUALLY TO ALL CHANNELS.

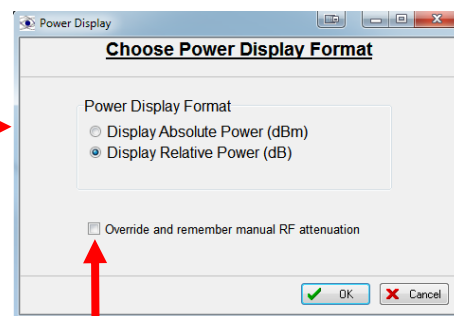
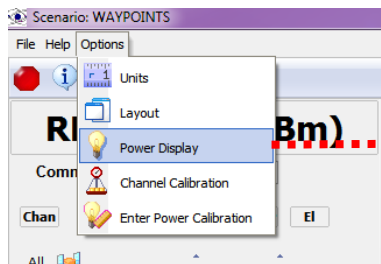
FLEX POWER. INDIVIDUAL LINK POWER C/A TO MP ETC. CAN BE SPECIFIED.

*NOTE: ONLY MODERNIZED GPS HAS FLEX-POWER CAPABILITIES. FOR LEGACY THESE ARE IGNORED

The following figure illustrates how these values are accessible real-time with RUN SCENARIO.

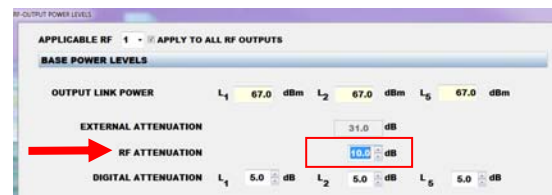
EXAMPLE 1: TAPMSEC IN RELATIVE POWER DISPLAY MODE

RUN SCENARIO [TAPMSEC] MAIN MENU

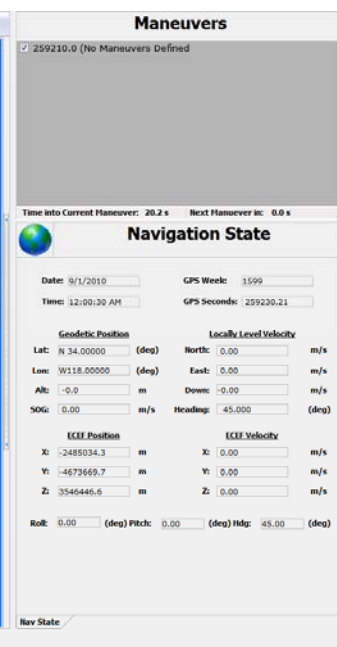
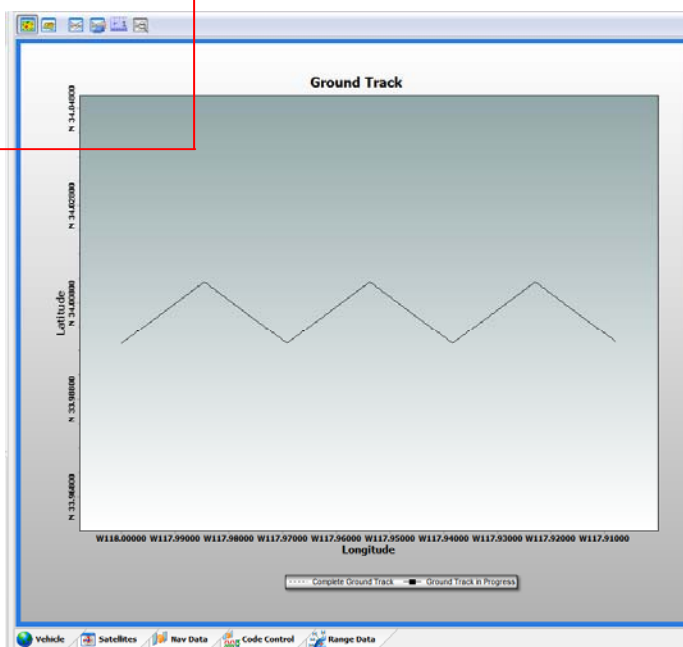
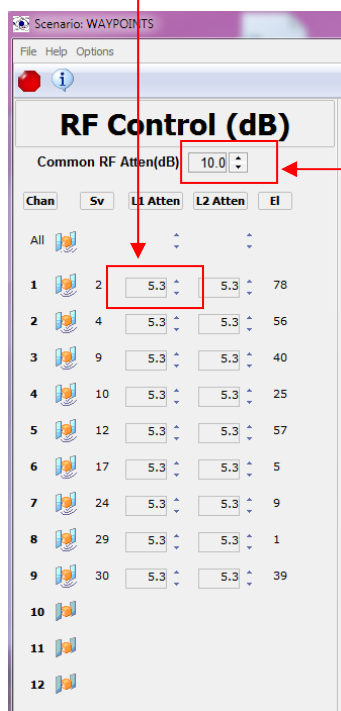
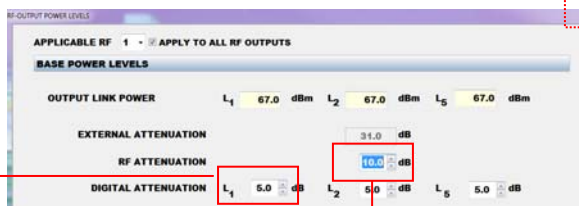


IF THIS IS CHECKED, THE RF ATTENUATION IN THE BUILD SCENARIO POWER MENU IS IGNORED AND [TAPMSEC] USES THE LAST VALUE YOU ENTERED FOR ALL SCENARIO'S AND SAVES IT FOR NEXT TIME YOU RUN

IF CHECKED THIS IS IGNORED

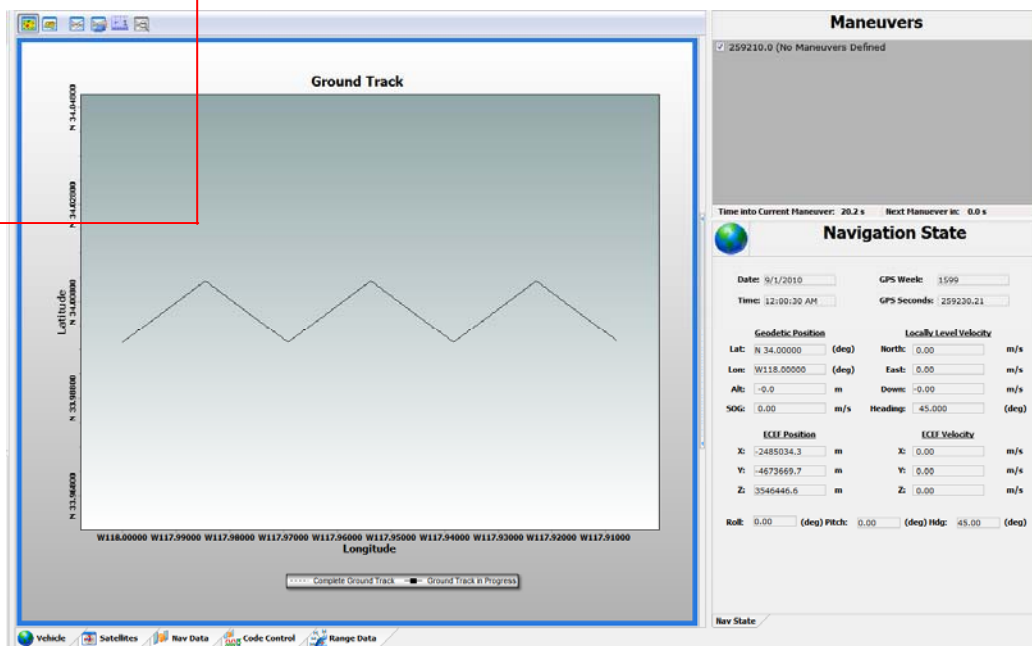
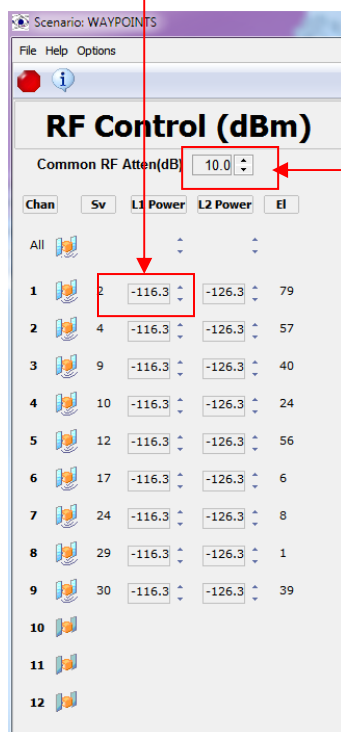
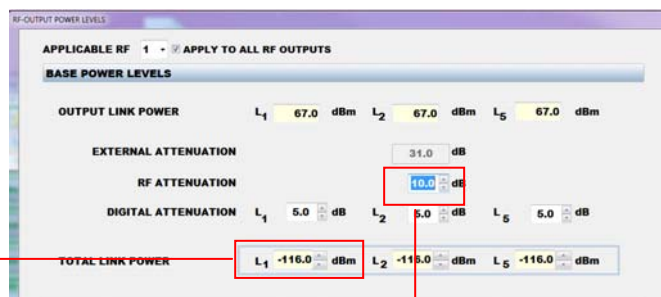
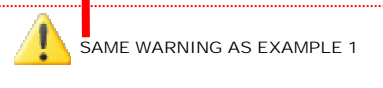
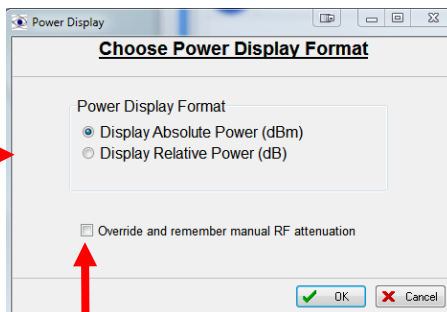
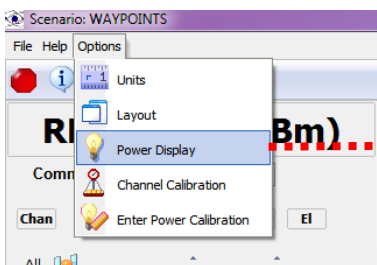


BUILD SCENARIO OUTPUT POWER MENU



EXAMPLE 2: TAPMSEC IN ABSOLUTE POWER DISPLAY

RUN SCENARIO [TAPMSEC] MAIN MENU



NOTE: IF YOU DO NOT SET THE FIXED ATTENUATION PAD TO THE CORRECT VALUE, THE ABSOLUTE POWER WILL BE WRONG BUT THE RELATIVE POWER WILL NOT

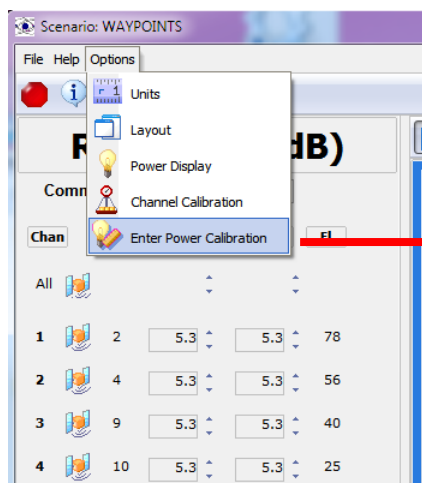
NOTE: IF YOU CHANGE THE RF ATTENUATION IN THE RUN SCENARIO, AND DO NOT MAKE THE SAME ADJUSTMENT IN BUILD SCENARIO, THE RF GAIN WILL REVERT TO THE PROGRAMMED VALUE AND NOT THE LAST VALUE YOU SET WITH THE UP/DOWN CONTROL.

BE AWARE OF THE CHECK SITUATION ON THE RF GAIN OVER-RIDE - SEE THE WARNING TRIANGLE ABOVE

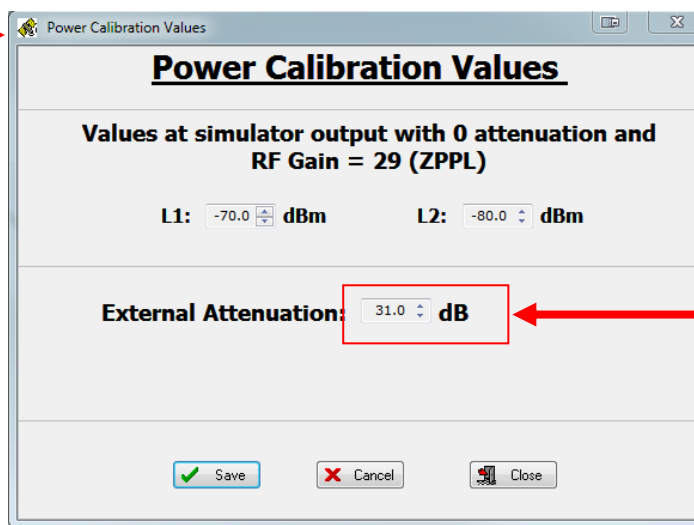
IF YOU HAVE 0 FIXED ATTENUATION, THEN YOU HAVE TO ADJUST THE RF GAIN TO A LARGE VALUE TO COMPENSATE OR YOU WILL OVERDRIVE THE GPS RECEIVER. (NO DAMAGE WILL RESULT)

TO CHANGE THE CALIBRATION VALUE, OR TO ADJUST FOR THE IN-LINE FIXED ATTENUATOR MAKE THE CHANGES AS FOLLOWS:

- FROM RUN SCENARIO [TAPMSEC] MAIN PULL DOWN



THIS MUST BE CORRECT FOR THE ABSOLUTE POWER TO DISPLAY THE RIGHT VALUES.





LEGACY RF OUTPUT SIGNAL-POWER BREAKDOWN

