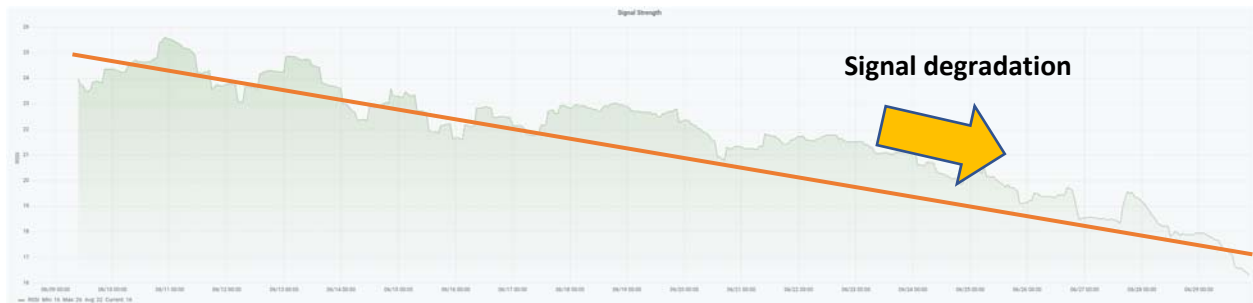


Recommendations for Boosting Antenna Signal

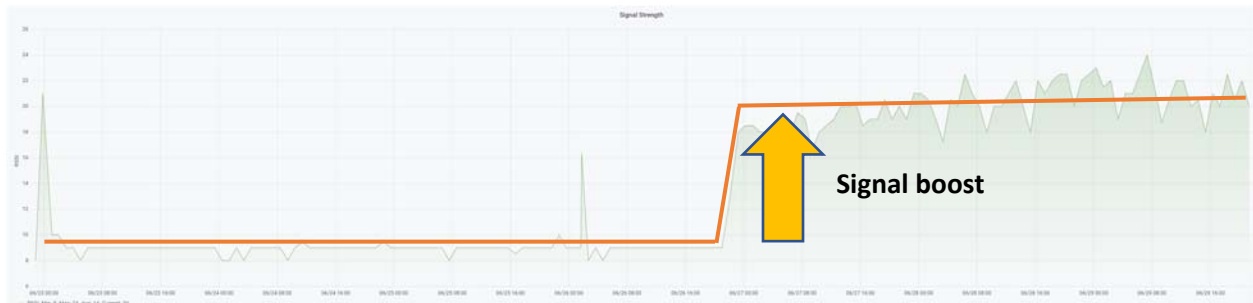
The following recommendation is especially applicable for the telemetry deployments in row crops where the crop canopy may attenuate the radio signal as it grows.

This app note is applicable to models: CSMP and LSMP.

As you can see, as the crops grow, the signal on this example device is progressively losing strength over time. The data connections are initially very reliable, but it might deteriorate later, to the point the radio may be struggling to send data.



We found that raising the antenna higher above the vegetation can boost the radio signals dramatically. See this example below. Initially, the device had spotty communication. But, after adding the antenna extension, the radio signal doubled, while the antenna is still kept below the pivot hardware.



This antenna cable has been verified to be good quality and is compatible with Zenseio telemetry. It can be readily obtained with different lengths (but it is recommended to use the shortest one that is expected to work)

<https://amzn.to/3hkkNvV>

Note: to provide the optimum radio performance and to comply with the FCC regulations, only Zenseio-approved antennas can be used. Do not change the antenna from the original one unless advised by Zenseio.

- Use a PVC, wood, or fiberglass pole to attach the antenna to, not a metal one
- Use UV-resistant zip-ties to attach the antenna and cable to the pole
- Do not hard bend the antenna cable - it should naturally curve

Here are the before and after photos:

