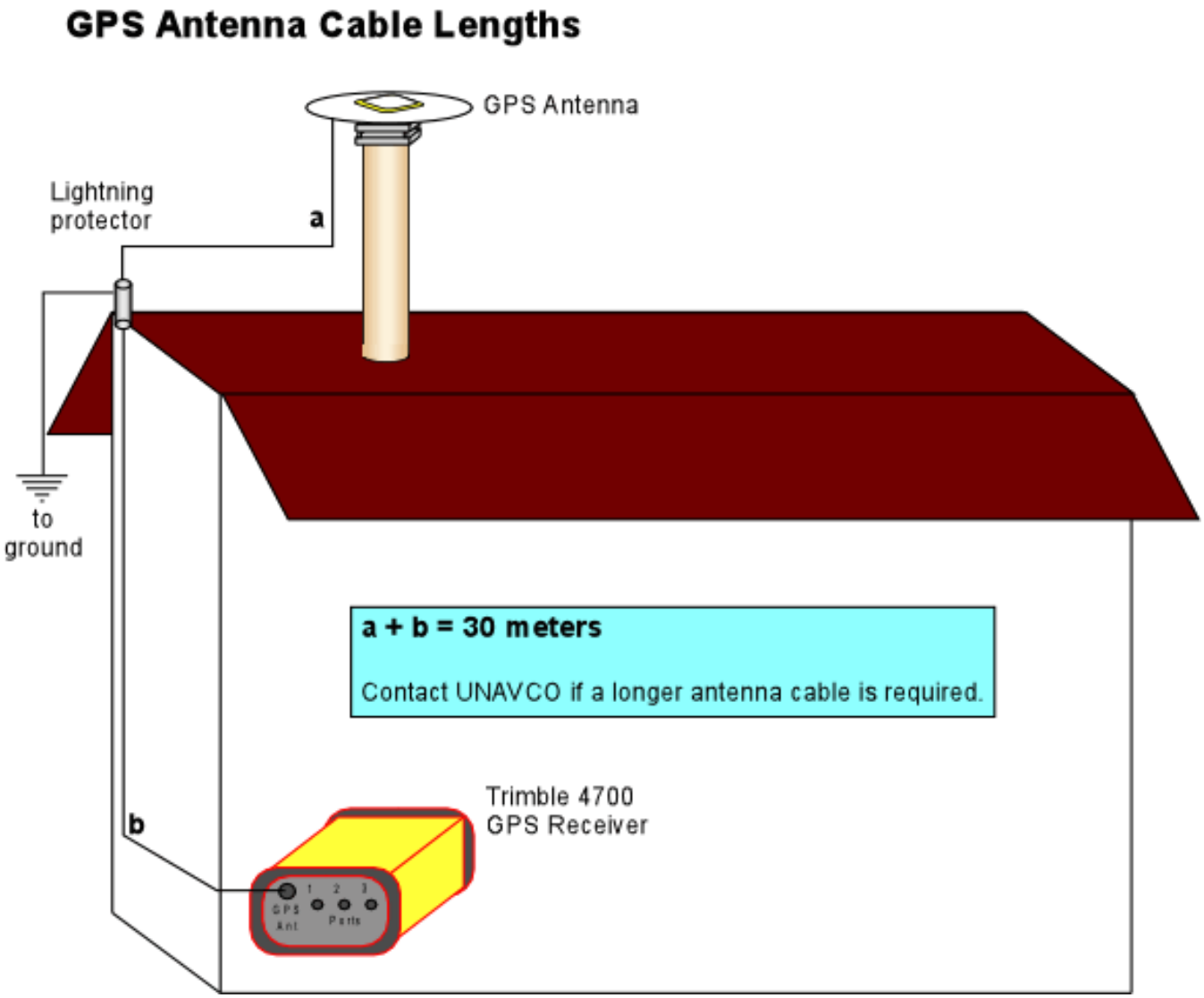
SuomiNet - GPS Antenna Cable

562 Beth Bartel December 29, 2009 SuomiNet Equipment 2348

Note - content is provided for historical continuity and may be out of date. The UNAVCO SuomiNet pages are not actively maintained, and up-to-date SuomiNet information should be obtained from UCAR's COSMIC program at: www.cosmic.ucar.edu/suominet.html

The standard SuomiNet GPS system comes with a 30 meter antenna cable. This cable will be modified by UNAVCO to accomodate a lightning protector. Ideally, the lightning protector will be located immediately outside the receiver enclosure (typically a building). UNAVCO needs to know the cable length A, from the GPS receiver to the lightning protector, and cable length B, from the lightning protector to the GPS antenna (A + B = 30 meters).



For cable runs longer than 30m custom cables must be used. Obtaining these cables is the responsibility of the participant. The total cable loss can not exceed 12dB.

Andrew Corporation Heliax Cable and Connectors available from Hutton Communications Inc.**:**

Cable Length (1)	Cable	Male N-type Connector	Cable Diameter	Minimum Bend Radius
31m-52m	LDF1-50	L1PNM-H	8.8mm	76mm
53m-61m	LDF2-50	L2PNM-H	11mm	95mm
62-93m	LDF4-50	L4PNM-H	16mm	125mm
94-162m	LDF5-50A	L5PNM-H	28mm	250mm

(1) Assumes lightning suppression and a 1m Lemo-N pigtail provided by UNAVCO.

GROUNDING DISCLAIMER: Lightning protector is typically graounded with 10 gauge or heavier bare copper wire clamped to an eight foot grounding rod driven in soil. This installation must be performed or approved by qualified facility personnel. Improper installation can cause damage to people and property.

Online URL: https://kb.unavco.org/article/suominet-gps-antenna-cable-562.html