

5.14.12 UBX-NAV-RELPOSNED (0x01 0x3C)

5.14.12.1 Relative Positioning Information in NED frame

Message	UBX-NAV-RELPOSNED					
Description	Relative Positioning Information in NED frame					
Firmware	Supported on: <ul style="list-style-type: none"> • u-blox 9 with protocol version 27.11 (only with High Precision GNSS products) 					
Type	Periodic/Polled					
Comment	<p>The NED frame is defined as the local topological system at the reference station. The relative position vector components in this message, along with their associated accuracies, are given in that local topological system</p> <p>This message contains the relative position vector from the Reference Station to the Rover, including accuracy figures, in the local topological system defined at the reference station</p>					
Message Structure	Header	Class	ID	Length (Bytes)	Payload	Checksum
	0xB5 0x62	0x01	0x3C	64	see below	CK_A CK_B
Payload Contents:						
Byte Offset	Number Format	Scaling	Name	Unit	Description	
0	U1	-	version	-	Message version (0x01 for this version)	
1	U1	-	reserved1	-	Reserved	
2	U2	-	refStationId	-	Reference Station ID. Must be in the range 0..4095	
4	U4	-	iTOW	ms	GPS time of week of the navigation epoch . See the description of iTOW for details.	
8	I4	-	relPosN	cm	North component of relative position vector	
12	I4	-	relPosE	cm	East component of relative position vector	
16	I4	-	relPosD	cm	Down component of relative position vector	
20	I4	-	relPosLength	cm	Length of the relative position vector	
24	I4	1e-5	relPosHeading	deg	Heading of the relative position vector	
28	U1[4]	-	reserved2	-	Reserved	
32	I1	0.1	relPosHPN	mm	High-precision North component of relative position vector. Must be in the range -99 to +99. The full North component of the relative position vector, in units of cm, is given by $relPosN + (relPosHPN * 1e-2)$	
33	I1	0.1	relPosHPE	mm	High-precision East component of relative position vector. Must be in the range -99 to +99. The full East component of the relative position vector, in units of cm, is given by $relPosE + (relPosHPE * 1e-2)$	
34	I1	0.1	relPosHPD	mm	High-precision Down component of relative position vector. Must be in the range -99 to +99. The full Down component of the relative position vector, in units of cm, is given by $relPosD + (relPosHPD * 1e-2)$	
35	I1	0.1	relPosHPLength	mm	High-precision component of the length of the relative position vector. Must be in the range -99 to +99. The full length of the relative position vector, in units of cm, is given by $relPosLength + (relPosHPLength * 1e-2)$	
36	U4	0.1	accN	mm	Accuracy of relative position North component	
40	U4	0.1	accE	mm	Accuracy of relative position East component	
44	U4	0.1	accD	mm	Accuracy of relative position Down component	
48	U4	0.1	accLength	mm	Accuracy of length of the relative position vector	
52	U4	1e-5	accHeading	deg	Accuracy of heading of the relative position vector	
56	U1[4]	-	reserved3	-	Reserved	
60	X4	-	flags	-	Flags (see graphic below)	