

# Errata

## OpenLR™ White Paper - version 1.5

Date: 2012-01-19



An open standard for  
encoding, transmitting  
and decoding location  
references in digital maps

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# Errata

<b>Error number</b>	1
<b>Section</b>	8.3.5
<b>Page</b>	58
<b>Date</b>	2012-01-19
<b>Description</b>	The specification of the closed line location reference is incorrect.

**Wrong**

Byte number	Name	Bit 7	Bit 6	Bit 5	Bit 4	Bit 3	Bit 2	Bit 1	Bit 0
1	Status	RFU	1 (ArF1)	0 (no point)	1 (ArF0)	1 (has attributes)	011 (version)		
2	Longitude (1)	longitude lower left corner point highest byte							
3	Longitude (2)	longitude lower left corner point middle byte							
4	Longitude (3)	longitude lower left corner point lowest byte							
5	Latitude (1)	latitude lower left corner point highest byte							
6	Latitude (2)	latitude lower left corner point middle byte							
7	Latitude (3)	latitude lower left corner point lowest byte							
8	Attribute 1	RFU	RFU	functional road class			form of way		
9	Attribute 2	lowest frc next point			bearing				
10	Attribute 3	distance to next point							
11	Longitude (1)	relative longitude upper right corner point highest byte							
12	Longitude (2)	relative longitude upper right corner point lowest byte							
13	Latitude (1)	relative latitude upper right corner point highest byte							
14	Latitude (2)	relative latitude upper right corner point lowest byte							
15	Attribute 1	RFU	RFU	functional road class			form of way		
16	Attribute 7	RFU			bearing				

**Table 1: Closed line location with two location reference points**

Data Size: 16 bytes  
 Area category: (11)<sub>2</sub>

Byte number	Name	Bit 7	Bit 6	Bit 5	Bit 4	Bit 3	Bit 2	Bit 1	Bit 0
1	Status	RFU	1 (ArF1)	0 (no point)	1 (ArF0)	1 (has attributes)	011 (version)		
2	Longitude (1)	longitude lower left corner point highest byte							
3	Longitude (2)	longitude lower left corner point middle byte							
4	Longitude (3)	longitude lower left corner point lowest byte							
5	Latitude (1)	latitude lower left corner point highest byte							
6	Latitude (2)	latitude lower left corner point middle byte							
7	Latitude (3)	latitude lower left corner point lowest byte							
8	Attribute 1	RFU	RFU	functional road class			form of way		
9	Attribute 2	lowest frc next point			bearing				
10	Attribute 3	distance to next point							
11	Longitude (1)	relative longitude upper right corner point highest byte							
12	Longitude (2)	relative longitude upper right corner point lowest byte							
13	Latitude (1)	relative latitude upper right corner point highest byte							
14	Latitude (2)	relative latitude upper right corner point lowest byte							
15	Attribute 1	RFU	RFU	functional road class			form of way		
16	Attribute 2	lowest frc next point			bearing				
17	Attribute 3	distance to next point							
...									
18+7*(i-4)	Longitude (1)	relative longitude upper right corner point highest byte							
19+7*(i-4)	Longitude (2)	relative longitude upper right corner point lowest byte							
20+7*(i-4)	Latitude (1)	relative latitude upper right corner point highest byte							
21+7*(i-4)	Latitude (2)	relative latitude upper right corner point lowest byte							
22+7*(i-4)	Attribute 1	RFU	RFU	functional road class			form of way		
23+7*(i-4)	Attribute 2	lowest frc next point			bearing				
24+7*(i-4)	Attribute 3	distance to next point							
...									
18+7*(n-3)	Longitude (1)	relative longitude upper right corner point highest byte							
19+7*(n-3)	Longitude (2)	relative longitude upper right corner point lowest byte							
20+7*(n-3)	Latitude (1)	relative latitude upper right corner point highest byte							
21+7*(n-3)	Latitude (2)	relative latitude upper right corner point lowest byte							
22+7*(n-3)	Attribute 1	RFU	RFU	functional road class			form of way		
23+7*(n-3)	Attribute 7	RFU			bearing				

**Table 2: Closed line location with n location reference points (n>2)**



Note:  $2 < i < n$   
 Data Size:  $16 + 7 * (n - 2)$  bytes  
 Area category:  $(11)_2$

Byte number	Name	Bit 7	Bit 6	Bit 5	Bit 4	Bit 3	Bit 2	Bit 1	Bit 0
1	Status	RFU	1 (ArF1)	0 (no point)	1 (ArF0)	1 (has attributes)	011 (version)		
2	Longitude (1)	longitude lower left corner point highest byte							
3	Longitude (2)	longitude lower left corner point middle byte							
4	Longitude (3)	longitude lower left corner point lowest byte							
5	Latitude (1)	latitude lower left corner point highest byte							
6	Latitude (2)	latitude lower left corner point middle byte							
7	Latitude (3)	latitude lower left corner point lowest byte							
8	Attribute 1	RFU	RFU	functional road class			form of way		
9	Attribute 2	lowest frc next point			bearing				
10	Attribute 3	distance to next point							
11	Attribute 1	RFU	RFU	functional road class			form of way		
12	Attribute 7	RFU			bearing				

**Table 3: Closed line location with two location reference points**

Data Size: 12 bytes  
 Area category:  $(11)_2$

Byte number	Name	Bit 7	Bit 6	Bit 5	Bit 4	Bit 3	Bit 2	Bit 1	Bit 0
1	Status	RFU	1 (ArF1)	0 (no point)	1 (ArF0)	1 (has attributes)	011 (version)		
2	Longitude (1)	longitude lower left corner point highest byte							
3	Longitude (2)	longitude lower left corner point middle byte							
4	Longitude (3)	longitude lower left corner point lowest byte							
5	Latitude (1)	latitude lower left corner point highest byte							
6	Latitude (2)	latitude lower left corner point middle byte							
7	Latitude (3)	latitude lower left corner point lowest byte							
8	Attribute 1	RFU	RFU	functional road class			form of way		
9	Attribute 2	lowest frc next point			bearing				
10	Attribute 3	distance to next point							
11	Longitude (1)	relative longitude upper right corner point highest byte							
12	Longitude (2)	relative longitude upper right corner point lowest byte							
13	Latitude (1)	relative latitude upper right corner point highest byte							
14	Latitude (2)	relative latitude upper right corner point lowest byte							
15	Attribute 1	RFU	RFU	functional road class			form of way		
16	Attribute 2	lowest frc next point			bearing				
17	Attribute 3	distance to next point							
...									
$18 + 7 * (n - 4)$	Longitude (1)	relative longitude upper right corner point highest byte							
$19 + 7 * (n - 4)$	Longitude (2)	relative longitude upper right corner point lowest byte							
$20 + 7 * (n - 4)$	Latitude (1)	relative latitude upper right corner point highest byte							
$21 + 7 * (n - 4)$	Latitude (2)	relative latitude upper right corner point lowest byte							
$22 + 7 * (n - 4)$	Attribute 1	RFU	RFU	functional road class			form of way		
$23 + 7 * (n - 4)$	Attribute 2	lowest frc next point			bearing				
$24 + 7 * (n - 4)$	Attribute 3	distance to next point							
$25 + 7 * (n - 4)$	Attribute 1	RFU	RFU	functional road class			form of way		
$26 + 7 * (n - 4)$	Attribute 7	RFU			bearing				

**Table 4: Closed line location with n location reference points (n > 2)**

Note:  $2 < i < n$   
 Data Size:  $19 + 7 * (n - 3)$  bytes  
 Area category:  $(11)_2$

Correct



<b>Error number</b>	2																																																						
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<b>Page</b>	60																																																						
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An open standard for  
encoding, transmitting  
and decoding location  
references in digital maps

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