Subject: Re: Modelling transition bends

Posted by Christian Rahmig on Mon, 01 Dec 2014 21:11:14 GMT

View Forum Message <> Reply to Message

Dear everyone,

Am 01.09.2014 11:46, schrieb Christian Rahmig:
> Dear railML users,
>
> with the ticket #251 (cf. [1]) we re-opened the topic of modelling
> transition bends, which was already "discussed" here in the forum some
> years ago (cp. [2]).
>
> [...]

at the last railML.org conference in Paris on 07.10.2014, I presented a
solution for the transition curve problem, which is applicable to railML
2.2 (see [1]).

In particular, there are two possible approaches based on <radiusChange>
element (see [2]):

(1) add further description of the radiusChange using the description
attribute. Thus, the type of the curve can be described. If not empty,
possible values can be:

  * UA_cubicParabola
  * UA_parabola4
  * UA_clothoide
  * UA_WienerBogen
  * UA_BlossBogen
  * UA_Sinusoide
  * UA_Cosinusoide
  * UA_other
  * UE, which marks the end of the transition curve.

(2) model the length of a transition curve between two other elements
using a new optional parameter named transitionLength:

  * transitionLength = 0 is a direct connection between straight lines
and circular arcs
  * transitionLength > 0 is a connection with a transition bend of a
certain length

Alternatively to (1), it could be also possible to put the name of the
transition curve element in a new optional parameter
geometryElementName, which would specify the linear track geometry
element starting at the marked point (radiusChange).

Any comments appreciated...

[1]
 http://documents.railml.org/events/slides/2014-10-08_rahmig- railmltransitionbends.pdf
[2] https://trac.railml.org/ticket/251

--
Christian Rahmig
railML.infrastructure coordinator