QGIS Application - Bug report #22038
Inconsistent intervals for similar labels in graduated classification

2019-05-09 03:40 PM - Mic Del

Status:	Open		
Priority:	Normal		
Assignee:			
Category:	Symbology		
Affected QGIS version:	3.4.6	**Regression?:**	No
Operating System:		**Easy fix?:**	No
Pull Request or Patch supplied:	No	**Resolution:**	
Crashes QGIS or corrupts data:	No	**Copied to github as #:**	29852

Description

Hi

There is currently an inconsistent meaning behind a similar appearance when we make a graduated classification.

In the legend label we see	... meaning for QGIS
a - b	$a \leq x \leq b$
b - c	$b < x \leq c$
c - d	$c < x \leq d$

Note that the first class has left inclusion but not the others.
We could wrongly expect from reading only the label :

a - b equals to $a \leq x < b$
b - c equals to $b \leq x < c$
c - d equals to $c \leq x < d$

... or any other scheme actually.

So the same "class interval label" have different interpretations if they are the first or not.

We need a label notation where the endpoints inclusions are explicit, for example :

common style	French style
[a, b]	[a, b]
(b, c]	]b, c]
(c, d]	]c, d]

... or at least if we keep the basic "a - b" notation then we must use the same interval scheme for all classes.

Note also that some softwares (R for example) use left-open/right-closed intervals by default :

label	meaning
(a, b]	]a, b]	a < x ≤ b
(b, c]	]b, c]	b < x ≤ c
(c, d]	]c, d]	c < x ≤ d

... and some others (like openJUMP) are left-closed/right-open :

label	meaning
[a, b)	[a, b[	a ≤ x < b
[b, c)	[b, c[	b ≤ x < c
[c, d)	[c, d[	c ≤ x < d

So we need :

- to use a consistent scheme for all classes
- to add an option to be able to choose the left-open or right-open scheme
- to add an option to generate the label with the common notation, the French (Bourbaki) notation or any other notation.

Thanks

History

#1 - 2019-05-10 10:54 AM - Mic Del

See also "Data class groupings" #16983