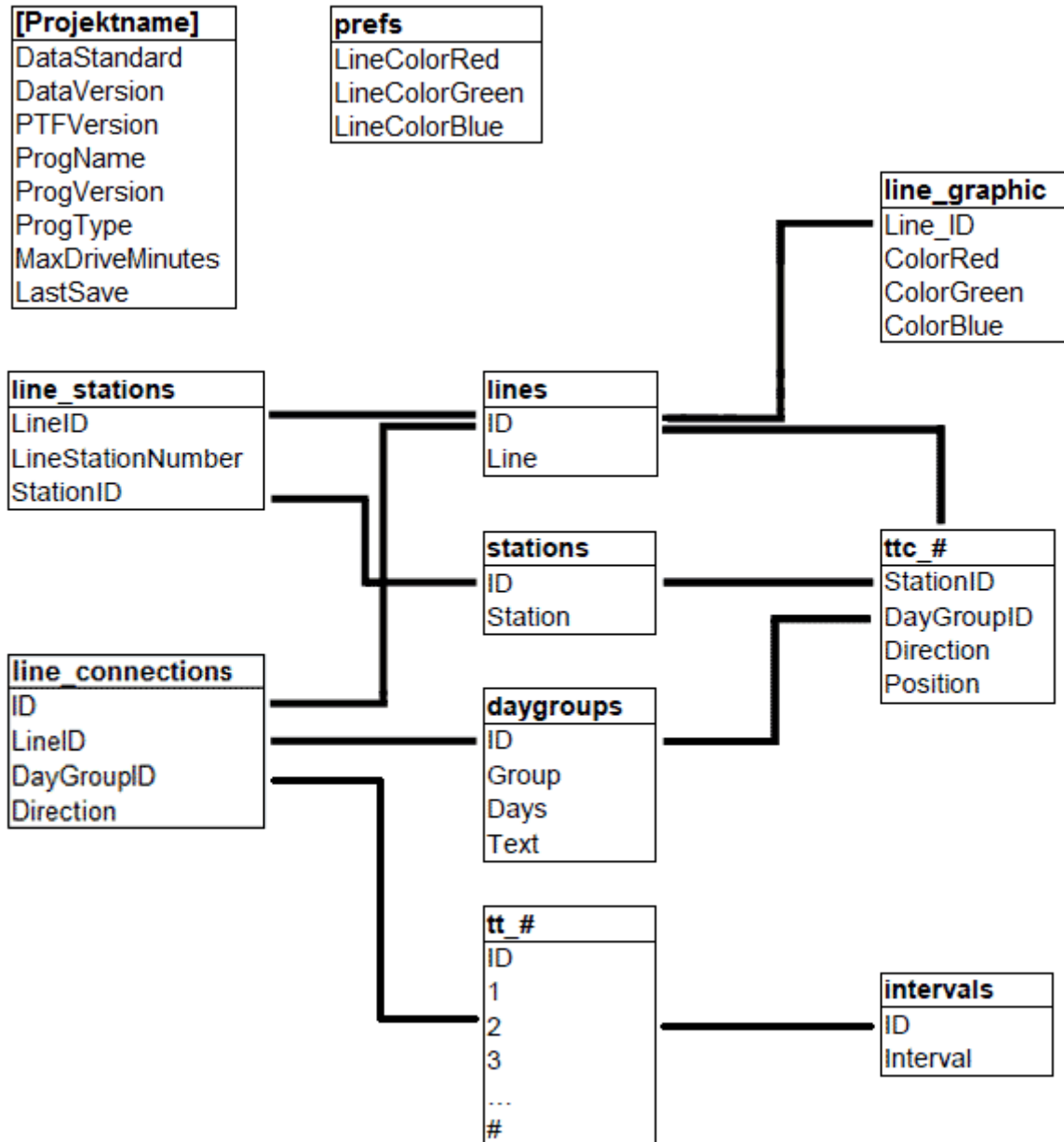# PTraffic Data Model 1.0.1

Entity Relationship Model

PTraffic uses tables in the Portable-Table-Format (PTF). For further information on the structure of PTF files please see the homepage of PublicSQL www.en.publicsql.org.

Entity relationship diagram:

Table description

This is a description of the content of the tables used.

Tables containing variable field names are marked with square brackets.

Table Name	Description
prefs.ptf	Contains various settings of the actual project. This table consists of a single data record.
stations.ptf	Contains the names of stations.
lines.ptf	Contains the names of lines.
daygroups.ptf	Contains the groups of weekdays (Monday-Friday, Saturday, Sunday).
line_graphic.ptf	Contains the colors for the lines if specified. The default color is not stored here.
line_stations.ptf	Contains the stations for every line.
line_connections.ptf	Contains the day of week and the directions of the available schedules.
[ttc_#.ptf] (# is the index of the line from lines.ptf)	Contains the stations in correct order for every line in every schedule-
[tt_#.ptf] (# is the index of the connections from line_connections.ptf)	Contains the schedules
intervals.ptf	Contains all available interval-times of the schedules (e.g. „20" if the train departs every 20 Minutes).
[Projektname.ppr] The file name consists of the project name and „.ppr" as filteype.	Contains project specific information. This Table consists of a single data record.

Change History

1.0.1

The data field „ProjectName" has been added to table prefs.ptf to enable Web-Applications to access a project without knowledge of the project name.

Table fields

The following is a description of all table fields.

The data type Date requires that the string is formatted according to the rules of date formats.

Fields with variable field names are marked with square brackets.

prefs.ptf

Field name	Description	Data type	Content/Range
ProjectName	Name of project	String	Example: Hamburg Railway
LineColorRed	Standard color of the line, Red value of RGB-notation.	Number	0..255
LineColorGreen	Standard color of the line, Green value of RGB-notation.	Number	0..255
LineColorBlue	Standard color of the line, Blue value of RGB-notation.	Number	0..255

stations.ptf

Field name	Description	Data type	Content/Range
ID	Unique index to the station.	Number	1...[Index of last station]
Station	Name of the station	String	Example: „Main Station"

lines.ptf

Field name	Description	Data type	Content/Range
ID	Unique index to the line. This value is also used to construct the table names for the table „ttc_#.ptf". Example: „ttc_1.ptf" for ID=1.	Number	1...[Index of last line]
Line	Name of the line	String	Example: „S31"

daygroups.ptf

Feldname	Beschreibung	Datentyp	Inhalt
ID	Unique index to access the group	Number	1...[index of last group]
Group	Short name of the group of days used within the program	String	Example:„MO-FR"
Days	7 character string, one character per weekday, starting with Monday. A value of "1" indicates the line is running at this day, a value of "0" indicates the line is not running at this day of week.	String	Example:„1111100" for Monday through Friday
Text	Text of the group of days in long format.	String	Example:„Monday - Friday"

line_graphic.ptf

Field name	Description	Data type	Content/Range
LineID	Index of the line(see lines.ptf)	Number	[Field ID from lines.ptf]
ColorRed	Color of the line, Red value of RGB-notation.	Number	0..255
ColorGreen	Color of the line, Green value of RGB-notation.	Number	0..255
ColorBlue	Color of the line, Blue value of RGB-notation.	Number	0..255

line_stations.ptf

Field name	Description	Data type	Content/Range
LineID	Index of the line(see lines.ptf)	Number	[Field ID from lines.ptf]
LineStationNumber	Sequence number of station per line	Number	1...[last station on line]
StationID	Index to station (see stations.ptf)	Number	[Field ID from stations.ptf]

line_connections.ptf

Field name	Description	Data type	Content/Range
ID	Unique index to access the connection. This value is also used to construct the table names for the table „tt_#.ptf" . Example: „tt_1.ptf" for ID=1.	Number	1...[Index of last connection]
LineID	Index for the line (see lines.ptf)	Number	[Field ID from lines.ptf]
DayGroupID	Index to the Group of days (see daygroups.ptf)	Number	[Field ID from daygroups.ptf]
Direction	Direction (1 oder 2)	Number	1...2

[ttc_#.ptf]

Field name	Description	Data type	Content/Range
StationID	Index of the station (see stations.ptf)	Number	[Field ID from stations.ptf]
DayGroupID	Index to the Group of days (see daygroups.ptf)	Number	[Field ID from daygroups.ptf]
Direction	Direction (1 oder 2)	Number	1...2
Position	Position of the station within the time schedule. The schedule is defined by fields DayGroupID and Direction. The value correlates to the field name in the associated table of schedules (see the table tt_#.ptf).	Number	1...[last Station]

[tt_#.ptf]

Field name	Description	Data type	Content/Range
ID	Sequence number of the trip.	Number	1...[last trip]
[1...last station within the schedule table]	1 field per station for the time within the schedule.	Number	Values smaller than -1 indicate an index from intervals.ptf. A value of -1 indicates no stop at this station. Values from 0 to 1439 are the time values in minutes. Values from 1440 to 2879 indicate a time value for the next day if the line runs across the 24 hour boundary.

Intervals.ptf

Field name	Description	Data type	Content/Range
ID	Unique index for the time interval.	Number	1...[Index of last interval]
Interval	Time of interval in minutes.	Number	Example: 10 if the line runs every 10 minutes.

[Projektname.ppr]

Field name	Description	Data type	Content/Range
DataStandard	Internet name of the data standard for this data model	String	'PTraffic' or 'PTraffic Pro'
DataVersion	Version number of the data standard for this data model	String	Example: 1.0
PTFVersion	PTF-Version. For details see www.publicsql.org	String	Example:1.0
ProgName	Internal program name of the program generating the data	String	'PTraffic' or 'PTraffic Pro'
ProgVersion	Internal program version of Ptraffic.	String	Example: 1.0.2
ProgType	Program type (Full version, Beta, Test version ...)	String	„Full" or „Beta" or „Test"
MaxDriveMinutes	Maximum drive time between 2 adjacent stations to check in the schedule editor.	Number	Initial Value: 720
LastSave	Date and time of last save of the project settings. The current version only changes the date after changing project settings.	Date	Example: 2011-04-14 14:08:40

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Naming the author may be omitted for users of a regular license of PTraffic.

Naming of the author of the data model must contain „Jörg Siebrands" as author as well as a reference to the website „www.ptraffic.net".