IntControl Quick Reference

Version 4.0.19

Revision History
1/8/2010   Edited by AECOM Consult, Inc.
4/15/2010   Edited by RSG, Inc.

Syntax:

IntControl [-flag] [control_file]

Purpose:
1. Synthesizes TRANSIMS sign and signal data from location lists.
2. Delete signs or signal records from an existing set of TRANSIMS traffic control files.
3. Appended new signs and signals to an existing set of TRANSIMS traffic control files.
4. Update the signal timing plans for selected locations and time periods based on turning movements or link delay data.

Required Keys

NET_NODE_TABLE	[net_directory]*filename*
NET_LINK_TABLE	[net_directory]*filename*
NET_POCKET_LANE_TABLE	[net_directory]*filename*
NET_LANE_CONNECTIVITY_TABLE	[net_directory]*filename*

Optional Keys

TITLE	text
REPORT_FILE	*filename*
REPORT_FLAG	FALSE {true/false/yes/no/1/0}
MAX_WARNING_MESSAGES	100,000
MAX_WARNING_EXIT_FLAG	TRUE {true/false/yes/no/1/0}
PROJECT_DIRECTORY	*pathname*
DEFAULT_FILE_FORMAT	VERSION3 {(4)}
INPUT_SIGN_FILE (1)	[project_directory]*filename*
INPUT_SIGNAL_FILE (2)	[project_directory]*filename*
NET_DIRECTORY	*pathname*
NET_SHAPE_TABLE	[net_directory]*filename*
NET_UNSIGNALIZED_NODE_TABLE (1)	[net_directory]*filename*
NET_SIGNALIZED_NODE_TABLE (2)	[net_directory]*filename*
NET_TIMING_PLAN_TABLE (3)	[net_directory]*filename*
NET_PHASING_PLAN_TABLE (3)	[net_directory]*filename*

NET_DETECTOR_TABLE (3)	[net_directory]*filename*
NET_SIGNAL_COORDINATOR_TABLE (3)	[net_directory]*filename*
NEW_DIRECTORY	*pathname*
NEW_UNSIGNALIZED_NODE_TABLE	[new_directory]*filename*
NEW_SIGNALIZED_NODE_TABLE	[new_directory]*filename*
NEW_TIMING_PLAN_TABLE	[new_directory]*filename*
NEW_PHASING_PLAN_TABLE	[new_directory]*filename*
NEW_DETECTOR_TABLE	[new_directory]*filename*
NEW_SIGNAL_COORDINATOR_TABLE	[new_directory]*filename*
DELETE_NODE_CONTROL_FILE (5)	[project_directory]*filename*
ADD_NO_CONTROL_RECORDS	FALSE {true/false/yes/no/1/0}
PRINT_SIGN_WARNINGS	FALSE {true/false/yes/no/1/0}
PRINT_MERGE_WARNINGS	FALSE {true/false/yes/no/1/0}
SIGNAL_CYCLE_LENGTH	60 seconds {30..240} (6)
MINIMUM_PHASE_TIME	5 seconds {1..cycle/2} (6)
YELLOW_PHASE_TIME	3 seconds {1..5} (6)
RED_CLEAR_PHASE_TIME	1 second {0..5} (6)
SIGNAL_DETECTOR_LENGTH	20 meters {5..50} (6)
POCKET_LANE_FACTOR	0.5 (6)
GENERAL_GREEN_FACTOR	1.0 (6)
EXTENDED_GREEN_FACTOR	0.6 (6)
SIGNAL_SPLIT_METHOD	CAPACITY (11)
MINIMUM_LANE_CAPACITY	500 vehicles/hour/lane {0..max} (6)
MAXIMUM_LANE_CAPACITY	1500 vehicles/hour/lane {0..2000} (6)
TIME_OF_DAY_FORMAT	24_HOUR_CLOCK {(7)}
TIME_PERIOD_BREAKS	0 {list of time values}
TIME_PERIOD_RANGE (9)	All (8)
TURN_MOVEMENT_FILE (10)	[project_directory]*filename*
LINK_DELAY_FILE (10)	[project_directory]*filename*
NET_DEFAULT_FORMAT	[default_file_format] {(4)}
NET_NODE_FORMAT	[net_default_format] {(4)}
NET_LINK_FORMAT	[net_default_format] {(4)}
NET_SHAPE_FORMAT	[net_default_format] {(4)}
NET_POCKET_LANE_FORMAT	[net_default_format] {(4)}
NET_LANE_CONNECTIVITY_FORMAT	[net_default_format] {(4)}
NET_UNSIGNALIZED_NODE_FORMAT	[net_default_format] {(4)}
NET_SIGNALIZED_NODE_FORMAT	[net_default_format] {(4)}
NET_TIMING_PLAN_FORMAT	[net_default_format] {(4)}
NET_PHASING_PLAN_FORMAT	[net_default_format] {(4)}

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NET_DETECTOR_FORMAT	[net_default_format] {(4)}
NEW_DEFAULT_FORMAT	[default_file_format] {(4)}
NET_SIGNAL_COORDINATOR_FORMAT	[new_default_format] {(4)}
NEW_UNSIGNALIZED_NODE_FORMAT	[new_default_format] {(4)}
NEW_SIGNALIZED_NODE_FORMAT	[new_default_format] {(4)}
NEW_TIMING_PLAN_FORMAT	[new_default_format] {(4)}
NEW_PHASING_PLAN_FORMAT	[new_default_format] {(4)}
NEW_DETECTOR_FORMAT	[new_default_format] {(4)}
NEW_SIGNAL_COORDINATOR_FORMAT	[new_default_format] {(4)}

Reports

INTCONTROL_REPORT_#	SIGNAL_TIMING_UPDATES

Notes

1	An input sign or unsignalized node file is needed to generate an output unsignalized node file. If an input sign file and an input unsignalized node file are provided, all of the records in the input unsignalized node file will be copied to the output unsignalized node file and then records from the input sign file are added to the output file.
2	An input signal or signalized node file is needed to generate an output signalized node file. If an input signal file and an input signalized node file are provided, all of the records in the input signalized node file will be copied to the output signalized node file and then records from the input signal file are added to the output file.
3	These files should be provided if an existing signal file set is being updated by records in an input signal file.
4	{VERSION3, BINARY, FIXED_COLUMN, COMMA_DELIMITED, SPACE_DELIMITED, TAB_DELIMITED, CSV_DELIMITED, DBASE, LANL, SQLITE3}
5	The traffic controls (signs or signal data) related to nodes included in this input file are deleted from the input network files before new information is generated / appended.
6	These fields accept a comma separated list of values (e.g., 60, 100, 60, 100, 60) to define a specific value for each time period. The example above could mean that the cycle length is 60 seconds from 0:00..6:00, 100 seconds from 6:00..9:30, 60 seconds from 9:30..15:30, etc. If the application includes multiple time periods, but fewer values are provided than the number of time periods specified, the last value is repeated for all subsequent time periods. For example, a key value of 60, 100 for the above example will make the cycle length 60 seconds from 0:00..6:00 and 100 seconds for the rest of the day.
7	{HOURS, SECONDS, 24_HOUR_CLOCK, 12_HOUR_CLOCK}
8	Time Range (e.g., 0:00..6:00, 18:00..23:00)
9	Time period range is only used in update mode to select specific time periods within the day to adjust the signal timing. The plans that are active during the period are updated.

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10	A Turning Movement or Link Delay File (but not both) are used to provide the demand data used for volume or update methods of setting signal timing plans.
11	{LANES, CAPACITY, VOLUME, UPDATE, LANE_SPLITS, CAPACITY_SPLITS, VOLUME_SPLITS} The lanes or capacity methods allocate the green splits based on the number of lanes or capacity or each approach / movement. The volume and update methods required a turning movement or link delay file to provide the demand for each approach / movement by time of day. The update method also requires input traffic control files and only updates the timing plans.

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