

TraMM is a software tool to monitor and manage the traffic signal controller WiTraC remotely from the Command and Control Centre. TraMM has dedicated Human Machine Interface graphic software to configure, visualize real traffic patterns and control the traffic signals remotely. It provides option to monitor the data in different visual formats such as Trends, Charts, Reports and Remote Animation Screens. Dedicated User Management System is a part of TraMM which embeds application links for user to navigate the overall system. Centralized junction configuration tool of TraMM facilitates plan download and upload functionality to configure the junctions remotely. It receives the online junction pattern periodically from different junction controllers and the same will be distributed to associated modules for display and reporting.

### SALIENT FEATURES

- ⊙ User Friendly GUI
- ⊙ User Management System
  - ✧ Application Management
  - ✧ Privilege Management
  - ✧ User Group Management
  - ✧ User Management
  - ✧ Administration
  - ✧ Login Page Configuration
- ⊙ Junction configuration
  - ✧ Junction
    - ♦ Phases
    - ♦ Stages
    - ♦ Cycles
    - ♦ Day Plan
    - ♦ Week Plan
    - ♦ Season Plan
    - ♦ Special Plan
    - ♦ Hurry Call
    - ♦ Setup
    - ♦ Poles
    - ♦ Detectors
  - ✧ Corridor
  - ✧ DOS Limits
  - ✧ Database
  - ✧ Housekeeping
  - ✧ Junction plan Download
  - ✧ Junction plan Upload
- ⊙ Junction animation configuration
  - ✧ Component palette
    - ♦ Standard editing components
    - ♦ Traffic components
  - ✧ Actions
  - ✧ Canvas



- ⊙ Junction Animation
  - ✧ Signal pattern display
  - ✧ Stage timings details
    - ♦ Stage No
    - ♦ Allocated
    - ♦ Available
    - ♦ Utilized
  - ✧ Online Graph
    - ♦ Intersection Utilized Cycle time
    - ♦ Intersection Allocated Cycle time
  - ✧ Online Junction parameter Details
    - ♦ Mode of Operation
    - ♦ Running Cycle
    - ♦ Stage of execution
    - ♦ Intersection Utilized Cycle time
    - ♦ Corridor Cycle Time
  - ✧ Remote administration Based
    - ♦ Flash
    - ♦ Auto
    - ♦ Hurry Call

## Visual effects

- ✧ Intersection Based Cycle and Stage graph
- ✧ Corridor based Cycle graph

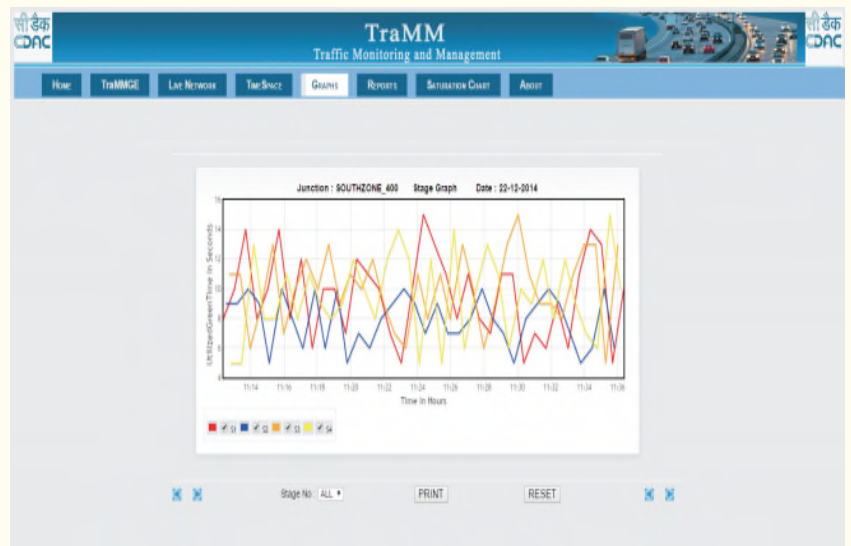
## Time Space Diagram

## Reports

- ✧ Corridor Report
  - ♦ Corridor Performance
  - ♦ Corridor Speed
- ✧ Junction Reports
  - ♦ Switching Reports
    - Stage Switching
    - Cycle Switching
    - Mode Switching
  - ♦ Timing Report
    - Stage Timing
    - Cycle Timing
    - Synchronization
  - ♦ Event Reports
    - Power up and Down
    - Link Status
    - Re-Join Status
    - Intensity Change Time
    - Plan Change
    - RTC Failure
    - Time update
    - Battery Voltage
    - Mode Change
    - Lamp Failure
    - Loop Failure
    - Inter-green conflict

## Saturation Chart

## Distributed architecture



## GUI BUILDING BLOCKS

### TraMM Graphic Editor

- ✧ Background image
- ✧ Standard drawing components
- ✧ WiTraC Specific Components
  - ♦ Junction Object
  - ♦ Indicative Green
  - ♦ Filter Green
  - ♦ Pedestrian
  - ♦ Straight Traffic

## OPERATING PLATFORM

Linux  
Web Server

## DATABASE

Open source PostgreSQL