

Israel

Master Plan for Public Transport and Bicycle Routes for Ofakim

Master Plan for Public Transport and Bicycle Routes for the City of Ofakim

Assignment Name: The Preparation of a Master Plan for Public Transport and Bike Paths for the City of Ofakim

Country: Israel

Location within Country: Ofakim

Name of Client: Ofakim Municipality

Financing Agency: Ofakim Municipality

Start Date: May 2020

Completion Date: Ongoing

Name of Associated Firm(s): N/A

Approx. Value of Services: US\$88,000



Detailed Narrative Description of the Project:

Ofakim is a growing city in southern Israel with plans to expand from about 30,000 to 80,000 residents over the next 20 years. This development involves the construction of new neighborhoods and facilities in addition to the densification and improvement of existing neighborhoods. ROM Transportation is consulting for the municipality of Ofakim regarding the development of the expanded transport networks such that the city retains a continuous urban character. The Public Transport elements of the plan are to consider the needs of existing and future residents as well as interactions with the local train station and nearby cities. New bike paths are to be planned for existing neighborhoods as well as new neighborhoods, with a particular focus on connectivity, the interaction between transport modes, and characterization of street cross sections.

Description of Services provided:

- Public Transport Assignment Model Development
- Bike Network Planning
- Street cross-section redesign recommendations
- Evaluation of mass transport and future transport needs
- Improvement of modal interaction and the provision of flexibility for future transport developments
- Recommendations for urban form development
- Designation of road hierarchy
- Establishment of phasing and project execution directives for relevant recommendations

2020 E-Bus Strategic Planning Framework

2020 E-Bus strategic planning framework	
Country: Israel	
Location within Country: Israel Metropolitan Areas	
Name of Client: Ministry of Transportation and relevant Metropolitan Transport Authorities	
Financing Agency: MOT	
Start Date: 4th Qtr 2019	Completion Date: Ongoing
Name of Associated Firm(s): Zagreb University: Professor Josko Daur	
<p>Detailed Narrative Description of the Project:</p> <p>The Israel Ministry of Transport has published a directive to begin moving toward electric bus utilization in urban PT services across the country in line with comprehensive new route planning for the year 2025. As part of this process, the necessary legal, infrastructure, planning, institutional and operational reforms are being updated to allow for the adoption and deployment of the new transport mode. Israel is in negotiation with a number of vehicle producers for the procurement of significantly sized bus fleets.</p> <p>The utilization of the E-Bus simulation tool, following a number of pilot projects, is now wide spread and being used for various tasks including:</p> <ul style="list-style-type: none"> • Identification of routes for electrification • Assessment of charging infrastructure • Estimation of power demand and grid loading • Optimization of charging points • Overall Cost-Benefit analysis of E-Buses for various uses 	
<p>Description of Services provided:</p> <ul style="list-style-type: none"> • Comprehensive data collection of existing bus performance • Strategic planning for E-Bus implementation • Assessment of locations and types of charging infrastructures • Development of policy and reforms to support E-Bus implementation • Scenario definition and testing in the E-Bus simulation tool • Development of recommendations for implementation at the local, regional and national level 	



Tel Aviv Metropolitan PT Framework

2025 Public Transport strategic operational plan as part of Mahir La'ir framework

Country: Israel

Location within Country: Tel Aviv Metropolitan area

Name of Client: Netivei Ayalon, Ministry of Transportation

Financing Agency: Netivei Ayalon

Start Date: June 2018

Completion Date: 2019

Name of Associated Firm(s): N/A

Approx. Value of Services: US\$150,000



Detailed Narrative Description of the Project:

The Ministry of Transport, through government owned company “Netivei Ayalon”, has allocated US\$ 1 Billion for a comprehensive PT rehabilitation framework for the metropolitan area of Tel Aviv which includes three dimensions: 1) infrastructure and priority bus lanes 2) bus operations and route network 3) operational management.

Cities ROM provided consultancy for within the framework:

- Herzeliya
- Ramat Ha’Sharon
- Elad
- Kfar Qasem
- Yehud
- Ganei Tikva

Description of Services provided:

- Demographic, bus operations, bus network and management analysis
- Development of Bus line scenarios and routing based on demand, planned LRT network and other planned developments
- Comprehensive conceptual plan for the city
- Inventory of potential policy and infrastructure projects for implementation
- Mapping and defining required operational bus depots
- Data analysis
- Origin-Destination matrices
- GIS Mapping

Tel Aviv Ofni-Dan

Tel Aviv Metropolitan Ofni-Dan bicycle highway network

Country: Israel

Location within Country: Tel Aviv

Name of Client: Ministry of Transportation

Financing Agency: Ministry of Transportation

Start Date: August 2015

Completion Date: 2017

Name of Associated Firm(s): MTL

Approx. Value of Services: N/A



Detailed Narrative Description of the Project:

In an effort to improve sustainable mobility in the Tel Aviv metropolitan area, ROM undertook the strategic planning and pre feasibility study of a bicycle highway network. Based on the assumption that the creation of high level and high quality skeleton of routes will encourage local municipalities to improve their NMT networks and connect to the high level highway network.

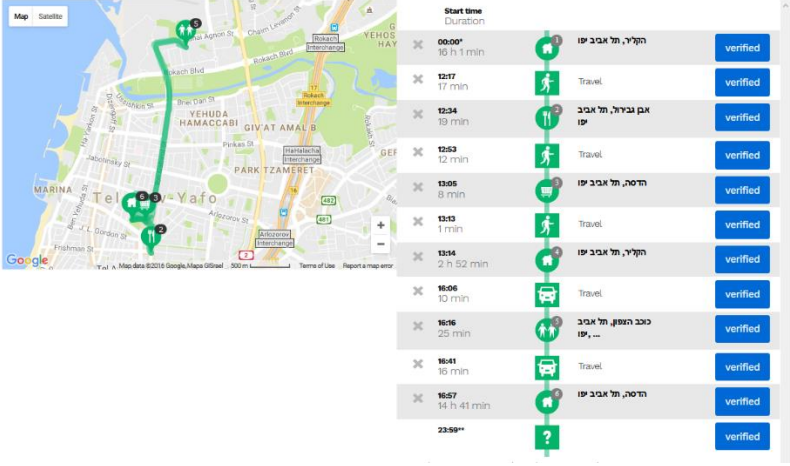
ROM undertook field surveys, demand analysis, detailed design, stakeholder meetings and financial analysis for the establishment of the project. As of 2018 the project is in a feasibility study late stage and preparing to move into the implementation stage.

Description of Services provided:

- Development of 9 high level bicycle routes to create an urban NMT network
- Definition of design guidelines for all infrastructures
- Field survey along all planned routes to ensure feasibility
- Analysis of demand along routes as well as land use and planned urban development
- Mapping and GIS surveys in full
- Detailed financial analysis of potential monetized savings as a result of implementation
- Calculation of implementation costs and assistance in procuring financing

Tel Aviv THS

Tel Aviv Metropolitan Region Travel Habits Survey

Country: Israel		
Location within Country: Tel Aviv		
Name of Client: Netivei Ayalon		
Financing Agency: Ministry of Transportation		
Start Date: August 2016	Completion Date: January 2018	
Name of Associated Firm(s): N/A		
Approx. Value of Services: US\$250,000		

Detailed Narrative Description of the Project:

ROM was commissioned to provide quality assurance and back office technical support for the Tel Aviv metropolitan region travel habits survey. This survey project is unique in a number of ways which have a direct effect on the ability and method ROM used to provide QA. First this is the largest survey of its kind undertaken in Israel with a goal of over 20,000 households. Second, the survey utilized an application based trip journal which automatically records survey participants movements, trip purposes and modal choice. Third, the data is collected into an advanced database system which provides automatic advanced analysis possibilities.

The dedicated ROM team was able to utilize the digital and application based reality of the survey to enhance Quality Assurance. The team is able to discern inconsistencies in data through various queries or follow participants activities in real time. The focus of the QA was to insure the consistency and reliability of the data for all attributes. The purpose of the survey overall is to create a metropolitan scale travel demand model for prioritization of future transportation projects, as such the responsibility of providing a high quality, error free database is essential.

Description of Services provided:

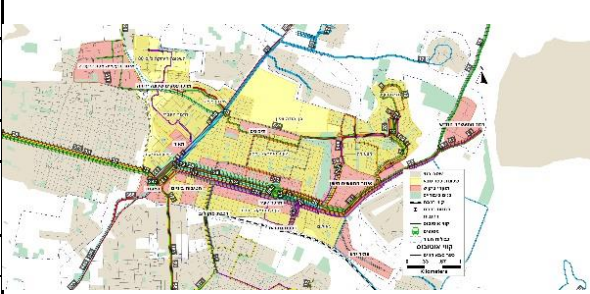
- Preparation of Survey Plan
- Participation in Pilot Surveys
- Participation in design and use of survey technologies
- Creation of QA computer software in tandem with survey applications
- Real time data analysis
- Flagging of systematic and random data errors
- Controlled data correction and procedures
- Constant stakeholder and survey team communication
- On site QA at time of survey questionnaire

Beit Shemesh PT Master Plan

Beit Shemesh Public Transportation Master Plan	
Country: Israel	
Location within Country: Bet Shemesh, part of Jerusalem Metropolitan Area	
Name of Client: Jerusalem Transport Master Plan Team	
Financing Agency: Ministry of Transportation	
Start Date: February 2016	Completion Date: 2018
Name of Associated Firm(s): N/A	
Approx. Value of Services: 400,000 USD	
<p>Detailed Narrative Description of the Project:</p> <p>ROM began working in close collaboration with the Jerusalem Transport Master Plan for the city of Beit Shemesh. The JTMP team initiated similar projects in the other key cities and areas in the metropolitan region. Beit Shemesh is a unique city because of its social makeup, topography, and rapid growth. The population of the city is expected to grow significantly by the end of the projects target year 2035. The socio economic makeup of the city is varied with large variation in residents' base incomes, and car ownership in the city is among of the lowest in the country. These issues equate to a challenging, yet necessary project scope with the objective of providing sustainable and accessible mobility that is open to all populations, and provides high-quality intercity and regional services.</p> <p>The project looks to integrate road transport sectors including heavy rail, light rail, bus services, and NMT to create useful and effective transportation infrastructures for a rapidly growing city in the long-term. The project will be responsible not only for improving the quality of life and accessibility within the city, but also regional connectivity, especially focusing on the city's important with Jerusalem, the regional and national center. The project will prioritize infrastructure and policy interventions up to 2035 for the city including potential BRT and LRT solutions.</p>	
<p>Description of Services provided:</p> <ul style="list-style-type: none"> • Comprehensive data collection • Stakeholder identification and participation • Transportation surveys and analysis • Inventory of potential policy and infrastructure projects for implementation • Assessment of transportation projects and transportation development scenarios in metropolitan TDM 	



Kfar Saba PT Master Plan


Kfar Saba – Public Transportation Master Plan	
Country: Israel	
Location within Country: Kfar Saba	
Name of Client: Municipality of Kfar Saba	
Financing Agency: Municipality of Kfar Saba	
Start Date: November 2015	Completion Date: 2017
Name of Associated Firm(s):	
Approx. Value of Services:	
	
<p>Detailed Narrative Description of the Project:</p> <p>In mid-2015 ROM began the Kfar Saba Public Transportation Master Plan. The general objective of the project was the creation of an integrated public transportation plan for the city which will provide for the needs of the City and its development in the middle and long term. The plan was built such that it would fit seamlessly into the City's larger development plans in order to serve as a foundation for future policy making and assist the City with metropolitan and national level transportation requirements. The project was split into two parts:</p> <p>Part A: Current Status Analysis and Short Term Recommendations – the provision of immediate improvements for the city based on a comprehensive analysis of the current situation was necessary to solve a number of growing problems in the City's most important districts. Supply and demand data were gathered to illustrate accessibility by public transportation within and outside of the city. In addition, information regarding forecasting and development plans were gathered and combined into the Master Plan.</p> <p>Part B: Public Transportation Strategy – this portion of the project focused on scenarios and options for the development of the mode for the City. Strategy focused on both urban services between demand nodes and neighborhoods in the City as well as its connection to the greater metropolitan region. The exercise was completed with the creation of a vision for Public Transportation. Public Transportation Strategy was delivered for the immediate, medium and long term.</p>	
<p>Description of Services provided:</p> <ul style="list-style-type: none"> • Review of current status for public transportation and transportation as a whole • Development of key indicators such as public transport supply and demand • Mapping of key demand nodes in and around the city as well as residential neighbors • Development of public transportation Vision • Stakeholder communication and participation • Modelling of public transportation demand in the city up to 2035 • Creation of public transportation alternatives • Identification of optimal alternatives with stakeholder participation • Development of Immediate, Medium and Long term public transportation strategy 	

Israel Railways Supervision

Israel Railways Civil Work Supervision	
Country: Israel	
Location within Country: Various locations (see below)	
Name of Client: Ministry of Transportation	
Financing Agency: Ministry of Transportation	
Start Date: 2012	Completion Date: 2017
Name of Associated Firm(s): N/A	
Approx. Value of Services: US\$250,000	
<p>Detailed Narrative Description of the Project:</p> <p>ROM was appointed by the Israel Ministry of Transportation to supervise all civil construction works on projects by Israel Railways, the state-owned railway authority. The budget for the projects supervised total 3.5 billion NIS (1 billion USD) annually. The various supervised railway works include:</p> <ul style="list-style-type: none"> • A-1 line from Jerusalem to Tel Aviv (57 km) • Sharon railway from Herzilya to Kfar Saba via Ra'anana (12 km) • Acre-Karmiel railway (23 km) • Jezreel Valley railway from Haifa to Beit She'an (59 km) 	



Haifa Metronit BRT

Haifa Metronit BRT	
Assignment Name: Monitoring the implementation of the Metronit until start of operation	
Country: Israel	
Location within Country: Haifa	
Name of Client: Noy investment fund (owner of 40% of the BRT)	
Financing Agency: Noy Fund	
Start Date: October 2011	Completion Date: December 2013
	
Name of Associated Firm(s)	
Approx. Value of Services: ~€100,000	
Detailed Narrative Description of the Project: Haifa began to operate a 3-line BRT System in October 2013 that will serve up to 80,000 passengers daily. Special features of this system include using special Euro 5 articulated buses, designated express lanes, full passenger information system, open ticketing system and an extensive feeder bus scheme. The implementation of the system will continue until late 2013. Noy Fund purchased recently 40% of the overall operation and sought assistance from ROM Transportation Engineering Ltd. to supervise and monitor the implementation work in order to make sure all deadlines are met, work is carried out in the most professional way and that project risks are mitigated as much as possible.	
Description of Services provided: ROM provided technical assistance to Noy Fund in the following areas: <ul style="list-style-type: none"> • Demand estimation and forecasted ridership • Financial and economic analysis through ticketing • Estimation of operational & maintenance (O&M) costs through operational benchmarks • Vehicle Repair & Maintenance costs • Vehicle energy cost estimation • Depot and terminal operations & maintenance • Analysis of procurement procedure for ITS and rolling stock • Project management supervision • Risk mitigation 	

Israel Sustainable City Contest

Sustainable City Contest	
Assignment Name: Sustainable Transport City Contest for National Budget of \$70M USD	
Country: Israel	
Location within Country: 17 largest cities across the country	
Name of Client: Ministry of Finance	
Financing Agency: Ministry of Finance	
Contact Person:	
Start Date: November 2011	Completion Date: January 2013
Name of Associated Firm(s): N/A	Approx. Value of Services: \$250,000 USD
Detailed Narrative Description of the Project: <p>The State of Israel is responsible for promoting sustainable transport solutions in urban areas. The primary purpose of this strategy is to improve affordable accessibility for all, improve urban layout, reduce congestion and minimize loss of time, and reduce environmental impact while improving road safety.</p> <p>Therefore, the ministry of finance and the ministry of transport launched an innovative contest among the 17 largest cities in Israel in which one city will be selected as the "Future city of Israel". The state will invest over 70M USD by 2016 in the winning city primary in Public Transport, Cycling, Walking and urban development to promote sustainable transport use, to shift passengers from private car and to make a show case for positive impact given synchronized and integrated solution.</p> <p>Another important aspect of this project is the change in mind set in the municipal level toward the need to promote sustainable transport in the political level, among professional staff and most important within the residents themselves.</p>	
Description of Services provided: DRAFTING RFP – URBAN and PUBLIC TRANSPORT DEVELOPMENT <ul style="list-style-type: none"> • Setting concept of contest • Defining project components with clear RFP description on Urban and PT development including the following components: <ul style="list-style-type: none"> ○ Dedicated bus lanes ○ New pedestrian mall and pedestrian infrastructure ○ Bike lane and other bike facilities ○ PT improved operational plan including Depot and terminals ○ Improved ITS scheme in the winning city with cutting edge technologies ○ Traffic control centre with PT prioritization ○ Sustainable parking scheme to support the shift to PT ○ PT passenger infrastructure – new and attractive bus stops, new passenger terminals, improved accessibility to bus stops, etc • Write down tender document for contest including evaluation criteria • Secure budget for consultancy service and implementation (70M USD) • Advocate project among 17 mayors and urge them to participate in the contest • Appraise 17 proposals including 17 site visits • Complete wide range of automated surveys including congestion GPS based survey, automated traffic counts, etc. • Complete budget due diligence for an accumulated budget of 1.4 Billion USD • Advice ranking of proposal quality and recommend for the ministry on the most suitable city to be selected (Ashdod) 	



- Assist ministry in negotiation with selected city and define agreement with it upon implementation scope, budget and time table
- Manage PR campaign for the project, advocate project among public through series of conference and meeting

BIDDING DOCUMENTS FOR SELECTED CITY

- Negotiate improved scope of work for selected city
- Finalize contract with the city with extended budget of 90M USD.
- Drafting the contractual structure for implementation of the project
 - Two main contractors for civil engineer along BRT corridor
 - 1 contractor for Control center
 - 1 contractor for ITS with subcontractor for control center and additional sub-contractor for traffic light
 - 1 contractor for street furniture including bus stops
 - 1 contractor for parking (under negotiation)
 - 1 contractor for bike lanes and pedestrian mall
- Assist in drafting bidding documents for all contractors and accompany cities in the entire implementation progress



Tel Aviv Traffic Demand/Revenue Forecast

Tel Aviv-Analysis of Traffic Demand & Revenue Forecasts for City Toll Entrance

Assignment Name: Traffic Demand and Revenue Forecast of Trips on the Fast Lane at the Entrance to Tel – Aviv

Country: Israel

Location within Country: Tel Aviv

Name of Client: Karen Noy

Financing Agency: Karen Noy Fund

Start Date:
July 2011

Completion Date:
January 2012



Name of Associated Firm(s): D-Cell

Approx. Value of Services: ~EURO €50,000

Detailed Narrative Description of the Project:

The City of Tel Aviv planned to install express toll lanes that charge an entrance fee at the city limits along Israel's principle highway route- Highway 1, which connects Tel Aviv to outlying eastern municipalities and Jerusalem. ROM was contracted to examine projected traffic demand along the express lane as well as make revenue forecasts for a 30-year concession period. ROM estimated the expected income target from 2011 to 2036 including income from fee payment of toll lane use (including shadow fee income from the state). The project also analyzes scenarios for expanding the number of toll lanes.

ROM provided technical assistance to Karen Noy in the following areas:

- Background Research of Franchising arrangements
- Establishing traffic behavior assumptions
- Data collection
- Creation of a Traffic Demand Model for Tel Aviv Region
- Traffic Demand Analysis up to the year 2040
- Revenue Forecasting
- Summary of findings and comparison with data from SDG
- Sensitivity Analysis
- Make a traffic & cost estimates for a gas station parking lot

Tel Aviv BRT Red Line

Tel-Aviv BRT Red Line Detailed Design, Ministry of Transport

Assignment Name: Detailed Design for a BRT Line in the Tel-Aviv Metropolitan Region

Country: Israel

Location within Country: Tel-Aviv Metro

Name of Client: Ministry of Transport

Financing Agency: See Client

Start Date: 2012

Completion Date: 2014



Detailed Narrative Description of the Project:
 Prior to the construction of the Tel Aviv LRT Red Line, the MOT commissioned ROM Transport to establish a BRT route which emulates the future LRT route. The idea is to establish regular ridership prior to the opening of the new mode such that passengers will be used to the route, stations and potential connections. ROM undertook all planning requirements in the project which became one of the leading bus routes in the metropolin..

Description of Services provided:
 ROM provided technical assistance to the Ministry in the following areas:

- Definition of route along the defined itinerary as well as adjusting the urban PT network to fit the future LRT mode
- Detailed financial and operational planning to establish the new route quickly
- Definition of ITS & complementary technologies
- Civil Engineering detailed design including definition of station and other guidelines
- Stakeholder Consultation, data collection and demand analysis
- Utilization of the Tel Aviv Metropolin travel demand model to assess the performance of the route
- Definition and establishment of Public Transport priority lanes along the BRT route

Tel Aviv BRT Detailed Design

Tel-Aviv BRT Detailed Design, Ministry of Transport

Assignment Name: Detailed Design for a BRT System in the Tel-Aviv Metropolitan Region

Country: Israel

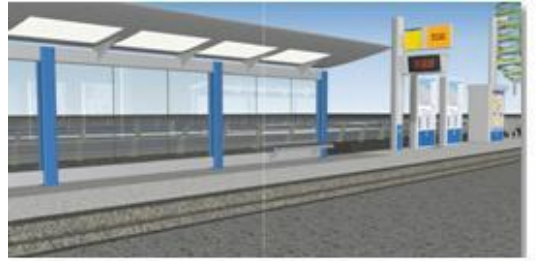
Location within Country: Tel-Aviv Metro

Name of Client: Mr. Yehuda Elbaz, MoT

Financing Agency: See Client

Start Date: 2010

Completion Date: 2012



Name of Associated Firm(s)

Approx. Value of Services: USD \$300,000

Detailed Narrative Description of the Project:


The Israeli Ministry of Transport commissioned ROM to prepare a detailed design for a BRT system consisting of 3 lines in the Metropolitan area of Tel-Aviv. The detailed design provides a plan for all aspects of station appearance and identification, including floor plans, dimensions, specification of materials and pre-fabricated station components and utilities such as shelters and lighting types. Also, a design concept is being provided for buses including color schemes and vehicle components.

Description of Services provided:

ROM provided technical assistance to the Ministry in the following areas:

- Transport Engineering and Planning
- Design an integrated Ticketing system
- Definition of ITS & complementary technologies
- Civil Engineering detailed design
- Stakeholder Consultation

Eastern Jerusalem Integrated Ticketing

Eastern Jerusalem Integrated Ticketing System, MoT & JTMT		
Assignment Name: Introduction of an Electronic & Integrated Ticketing System for 18 Operators in East Jerusalem		
Country: Israel		
Location within Country: Jerusalem		
Name of Client: Mr. Nadav Maroz, JTMT General Director		
Financing Agency: MoT		
Start Date: 2010	Completion Date: 2011	Approx. Value of Services: Value: USD \$80,000
Detailed Narrative Description of the Project: 18 different operators provide public transport service in Eastern Jerusalem with different types of vehicles and a different tariff system. The client has commissioned ROM to define a completely new integrated ticketing system where all operators will comply with one fare structure. In addition, the consultant is now defining the role and scope of a clearing house to facilitate the integration of the system and enable transfers between operators. The assignment also includes the specification of the required technologies such as TVM, validators, etc.		
Description of Services provided: ROM provided all consultancy services in this project.		

Tel Aviv BRT Feasibility Study

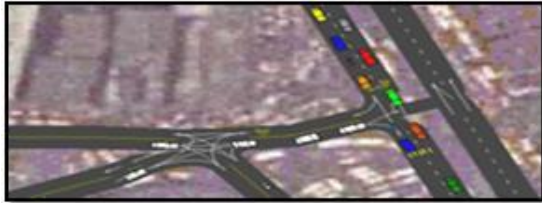

Tel-Aviv BRT Network, Ministry of Transport	
Assignment Name: Feasibility study, Design and Implementation of a BRT network for the Tel-Aviv Metropolitan Region	
Country: Israel	
Location within Country: Tel-Aviv Metro	
Name of Client: Mr. Yehuda Elbaz, MoT	
Financing Agency: See Client	
Start Date: 2010	Completion Date: 2011
Name of Associated Firm(s)	Approx. Value of Services: USD \$300,000
Detailed Narrative Description of the Project: The Israeli Ministry of Transport commissioned ROM to conduct a quick feasibility study for the implementation of a BRT system consisting of 3 lines in the Metropolitan area of Tel-Aviv. Based on this analysis, the Ministry financed the implementation plan for the operation of the first BRT line, the Red Line, within 2 years.	
Description of Services provided: ROM provided technical assistance to the Ministry in the following areas: <ul style="list-style-type: none"> • Transport Engineering and Planning • Demand Forecasting • Financial Analysis • Design an integrated Ticketing system • Definition of ITS & complementary technologies • Civil Engineering detailed design • Operational plan and reorganization of PT lines • Data Collection & surveys • Stakeholder Consultation 	

Jerusalem Parking Scheme

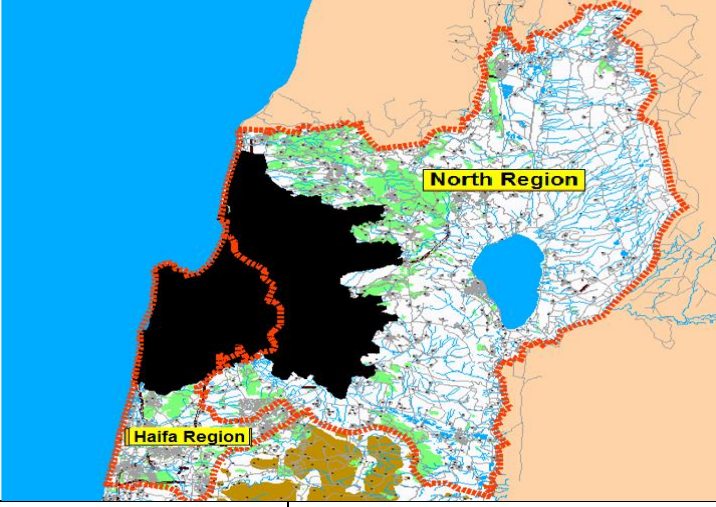
Parking Scheme for the Jerusalem City Centre	
Assignment Name: Parking Scheme for the Jerusalem City Centre	
Country: Israel	
Location within Country: Jerusalem	
Name of Client: Municipality of Jerusalem, Jerusalem JTMT	
Contact Person: Mr. Yehoshua Birotker	
Financing Agency: Municipality of Jerusalem, Jerusalem JTMT	
Start Date: Nov. 2010	Completion Date: Nov. 2011
Associated consultants: NR	
Approx. Value of Services: USD \$100,000	
No of staff: 4	No of staff-months provided by associated consultants: 0
No of staff-months: 6	
Professional staff provided by our firm (Parking expert, Project Manager, Survey Manager and Data Analyst, GIS Expert, survey manager, economist	
Detailed Narrative Description of the Project: A new LRT line was opened recently in Jerusalem connecting several residential areas to the city center. The City of Jerusalem is now updating its parking policy to improve accessibility to the city center by public transport. The municipality also wanted to improve its understanding of the balance between demand and supply for parking within the downtown and surrounding neighborhoods of the city and how it could be further optimized. One method the city explored was to increase short-term parking spaces in order to increase parking space efficiency due to the high number of short-term visits. Additionally, a study for planning new park and ride facilities for several of the LRT stations was performed. Therefore, the city needs to collect data of on-street and parking lot activity as well as understand the behavior and motivation of drivers parking in Jerusalem's central area.	
Description of Services provided by ROM: ROM was selected to help the city formulate a new transport policy in the city center, as well as provide a coherent strategy for implementation.	
<p style="text-align: right;">The assignment included:</p> <ul style="list-style-type: none"> • Stakeholder meetings • Review of existing parking policy and current condition • Extensive surveying for demand-supply of parking within the city center including a Stated-preference survey, parking duration analysis, parking inventory survey (off & on street), video surveillance surveys • Planning of park & ride facilities for new LRT line • Data validation, analysis, GIS • Defining a new parking model that prioritizes short-term parking 	



Jerusalem BRT Schemes

Designing Priority Schemes for Jerusalem BRT (JTMT. 2009)	
Assignment Name: Designing Priority Schemes for Jerusalem BRT (JTMT. 2009)	
Country: Israel	
Location within Country: Jerusalem	
Name of Client: Ministry of Transport and the Municipality of Jerusalem	
Financing Agency: Ministry of Transport	
Start Date: March 2009	Completion Date: March 2010
Name of Associated Firm(s)	Approx. Value of Services: USD \$70,000
Detailed Narrative Description of the Project: The first phase of the Jerusalem LRT also includes a BRT line. ROM was assigned by the Israeli Ministry of Transport and the Municipality of Jerusalem to evaluate various alternatives for priority measures of the BRT line. The analysis includes also micro-simulation of very sophisticated traffic-actuated traffic signal design. Based on the micro-simulation results, a preferred priority scheme was selected.	
Description of Services provided by ROM: ROM provided transportation planning, model development and calibration, alternative analysis and provide a scenario analysis summary for decision makers	

Haifa PTA

TC for Establishment of Haifa PTA		
Assignment Name: EU Twinning for Haifa PTA		
Country: Israel		
Location within Country: City of Haifa		
Name of Client: Ministry of Transport and Yefe Nof		
Financing Agency: EU		
Start Date: 2009	Completion Date: 2010	Approx. Value of Services: EUR €50,000
Name of Associated Firm(s)		
Detailed Narrative Description of the Project: <p>The EU financed a twinning project for the establishment of a Public Transport Authority in the Haifa metropolitan area</p> <p>The Israeli Ministry of Transport and the EU are exploring the feasibility of introducing a new regional transport authority for the Haifa Metropolitan area. ROM was hired by the Ministry of Transport to prepare all the relevant information.</p>		
Description of Services provided by ROM: <p>ROM consulted the public sector in Israel in all relevant aspects including:</p> <ol style="list-style-type: none"> (1) Setting the geographical boundaries of the authority; (2) Allocation of responsibilities among the various stakeholders; (3) Budget and financing options. (4) Describing current and future public transport systems in the region (5) Review current legal framework and identifying changes needed in the various laws and regulations (6) Proposal for the tasks and activities of the proposed transport authority 		


Haifa Cable Car

Haifa Cable Car, Municipality of Haifa	
Assignment Name: Haifa Cable Car, Municipality of Haifa	
Country: Israel	
Location within Country: Haifa	
Name of Client: Municipality of Haifa	
Financing Agency: Ministry of Transport	
Start Date: 2008	Completion Date: 2009
Name of Associated Firm(s): TASC Strategic Consulting	
Approx. Value of Services: USD \$100,000	
Detailed Narrative Description of the Project: <p>The Municipality of Haifa is considering a commuting cable car that will link the academic institutes in the Carmel Mountain – The Technion and the University of Haifa – with its major transit hub and a large shopping and recreational center</p>	
Description of Services provided by ROM: <p>ROM was selected to assist the municipality in the tendering process in all transportation aspects. The task composes of all transportation issues:</p> <ul style="list-style-type: none"> • Create a demand model for the proposed facility • Propose suitable ticketing framework • Identify suitable mechanism to distribute revenues among various transit operators • Interface with other transit facilities 	



Tel Aviv Congestion Pricing

Tel-Aviv Congestion Pricing Scheme

Assignment Name: Tel-Aviv Congestion Pricing Scheme		
Country: Israel		
Location within Country: Tel-Aviv		
Name of Client: MOT		
Financing Agency: MOT		
Start Date: 2007	Completion Date: 2008	Approx. Value of Services: US \$300,000
Name of Associated Firm(s)		

Detailed Narrative Description of the Project:

In this project ROM consulted the Ministry of Transport in Israel regarding the best option to reduce congestion and pollution in the Tel-Aviv Metropolitan Area.

As part of the assignment, ROM prepared a detailed survey of the recent worldwide experience, analyzed the transport and environmental effects of various pricing and restriction options, measured public support for the various options and recommended the optimal scheme.

The assignment included also regulatory and legal analysis.


Description of Services provided by ROM:

- Extensive literature review for theoretical & practical justification for Congestion Pricing
- Conducted several surveys to expand the existing Tel-Aviv Metropolitan TDM
- Developed an intermediate model that consider congestion toll scenarios
- Ran various tolling scenarios and evaluated transportation impact
- Developed an economic model that analyses the economic viability of the project
- Conducted an environmental impact analysis for each scenario
- Met with stakeholders (city mayors, MOT key personnel) to identify their support
- Reviewed sociological acceptance and inequality aspects of this problem
- Reviewed regulatory framework of this new concept and suggest the most acceptable way to promote it from the institutional point of view.
- Compared several technological alternative and propose the most suitable one for Tel-Aviv
- Developed an immediate implementation plan for this project

Jerusalem TA

Establishment of a New Transport Authority for Jerusalem	
Assignment Name: Establishment of a New Transport Authority for Jerusalem	
Country: Israel	
Location within Country: The City of Jerusalem	
Name of Client: Ministry of Transportation, Israel	
Contact Person: Yehuda Elbaz, Director of Public Transport Department, Ministry of Transport, Israel, Tel: +972-506-212074	
Financing Agency: Client	
Start Date: March 2006	Completion Date: September 2006
Associated consultants: Halufa Kehat Ltd	Approx. Value of Services: USD \$85,000
No of staff: 3 No of staff-months: 4	No of staff-months provided by associated consultants: 3
Professional staff provided by our firm (profiles): Project manager, legal advisor, organizational expert	
Detailed Narrative Description of the Project: The Ministry of Transport and the Municipality of Jerusalem decided to establish a new transport authority for Jerusalem. This authority will have full legal power given to it by law. This is a pilot project and based on the lessons learned, additional authorities will be established in the other metropolitan areas of Israel.	
Description of Services provided by ROM: <ul style="list-style-type: none"> • Determined the functions and responsibilities for the new authorities • Recommended the organizational structure and the staffing requirements including staff qualifications • Proposed the legal changes required for the implementations 	

Jerusalem JTMP and BRT

The Jerusalem Transportation Master Plan and BRT Scheme and Design		
Assignment Name: The Jerusalem Transportation Master Plan		
Country: Israel		
Location within Country: Jerusalem		
Name of Client: Ministry of Transport and the Municipality of Jerusalem		
Contact Person: Alex Langer, Deputy Director, Ministry of Transport, Jerusalem, Israel. Tel. +972-2-6663100		
Financing Agency: Ministry of Transport		Approx. Value of Services: USD \$700,000
Start Date: March 2000	Completion Date: October 2004	Professional staff provided by our firm (profiles): Project manager, traffic engineer, bus service designer, infrastructure engineer, transportation planner, architect, urban planner
No of staff: 6	No of staff-months: 35 in 4 years	No of staff-months provided by associated consultants: 28
Associated consultants: MTI Engineering Ltd.		
Detailed Narrative Description of the Project:		
<p>From 1994 to 2004, Dr. Moshe Hirsh, ROM's general manager, served also as director of the Jerusalem Transportation Master Plan Team (JTMT). The master plan included also the preparation and promotion of mass transit master plan for Jerusalem Metropolitan area. The adopted plan includes a combination of LRT and BRT lines. The plan was approved by the government and the first LRT line is now under construction, while the construction of the first BRT route is finished.</p> <p>The LRT line is constructed by the private sector, following a successful tender to grant a 30-year concession. A major part of the approved plan is the planning and implementation of new traffic arrangements in Jerusalem. These arrangements will fully separate the LRT and the BRT from other vehicles, and grant the vehicles priority in intersections. As a consequence of the new plan, the direction of traffic was changed in many roads; many new pedestrian ways were and a ring-road was developed to minimize traffic in the city center.</p> <p>The BRT is a complimentary corridor to the first Jerusalem LRT line. Earlier feasibility studies have shown that the BRT corridor will increase demand for the LRT and will improve the total transit ridership. The BRT was designed to accommodate high-capacity guided buses (i.e. the 24-meter-long Phileas bus), fully separated from other vehicles but still integrated with the urban environment. The picture presented here shows the BRT and the LRT alignments. The BRT corridor was designated at the end of 2006. This corridor is constructed as a full public sector project, while the LRT corridor was constructed as a BOT project.</p>		
Description of Services provided by ROM:		
<p>ROM provided:</p> <ul style="list-style-type: none"> • Transportation planning • Model development and calibration • Alternative analysis • Geometric and infrastructure design • Urban integration design. <p>Dr. Hirsh managed all relevant activities, including:</p> <ul style="list-style-type: none"> • Traffic demand model preparation • Corridor selection • Engineering design • Legal reform • Tender process • Selection of the concessionaire and granting the concession and assisting in the financial closure. 		

Jerusalem LRT

Jerusalem LRT – Detail Design of the Red Line

Assignment Name: Jerusalem LRT – Detailed design of the Red line

Country: Israel

Location within Country:
City of Jerusalem

Name of Client:
Ministry of Transport and the Municipality of Jerusalem. Ministry of Transport, Government Centre, Kiryat Ben-Gurion, Jerusalem, Israel

Contact Person:
Alex Langer, Deputy Director, Ministry of Transport, Jerusalem, Israel. Tel. +972-2-6663100

Financing Agency: MOT



Start Date:
October 1998

Completion Date:
December 2005

Approx. Value of Services:
USD \$1,800,000

No of staff: 6

No of staff-months:
120 in 7 years

Professional staff provided by our firm (profiles):
Project manager, traffic engineer, bus service design, infrastructure engineer, transportation planner, architect, urban planner

Associated consultants: Various

No of staff-months provided by associated consultants:

Detailed Narrative Description of the Project:

The first LRT line of Jerusalem is a 14 km-long, fully separated LRT line, with 22 stations. Bus service in the city was reorganized to feed and support the BRT and the LRT lines, with priority granted to the LRT at all signalized intersections. The vehicle will be fully low floor bi-directional.

The LRT technology was selected after a cost-benefit comparison with BRT technology. Following an extensive feasibility study, several financing alternatives were evaluated and discussed with the Ministry of Finance. A PPP approach was selected, in which the private sector was involved under a BOT scheme. The financial closure agreement was signed in January 2006. The Red Line began free and limited passenger service on August 19, 2011. Full service operations began on December 1, 2011.

Description of Services provided by ROM:

Full project management, financial analysis, demand analysis including the development of full disaggregate mode-choice model, local engineering design

Israel Ministry of Transport Projects

Monitoring Projects Financed by the Ministry of Transport

Assignment Name:

Monitoring and Supervision the implementation of all transportation infrastructure projects financed by the Ministry of Transport

Country:

Israel

Location within Country:

All municipalities and local authorities in the country

Name of Client:

Ministry of Transportation, Israel

Contact Person:

Itzhak Zuchman, Director, Transport Infrastructure Department, Ministry of Transportation, Israel

Financing Agency:

MoT

Start Date:

June 1998

Completion Date:

March 2002

Approx. Value of Services:

USD \$2,200,000

Name of Associated Firm(s):

No of staff-months provided by associated consultants:

Detailed Narrative Description of the Project:

The Ministry of Transport allocates around US \$500 Million per year to implement transportation infrastructure in local municipalities. This amount represents an average of 70% of the total cost of the projects. The Ministry finances around 600 projects per year, from "simple" safety improvements up to large scale and complex urban freeways. The required services covered full range of engineering and financial auditing & monitoring for all

Description of Services provided by ROM:

Project management and coordination, evaluating the priority of each project, auditing the engineering design, recommending priorities to the Ministry of Transport, monitoring the construction, checking the project bills, verifying funding availability and sources



Israel Ministry of Interior Budget

Monitoring and Control of the Municipal Development Budget Allocated by the Ministry of the Interior, Israel		
Assignment Name: Monitoring and Control of the Municipal Development Budget Allocated by the Ministry of the Interior, Israel		
Country: Israel		
Location within Country: All local municipalities in Israel		
Name of Client: Ministry of the Interior, Israel Contact Person: Ilan Price, Head of municipal development budgets, Ministry of the Interior, Jerusalem, Israel. Tel: +972-2-6701477		
Financing Agency: ISPARK		
Start Date: June 2000	Completion Date: May 2001	Approx. Value of Services: USD \$ 423,000
No of staff: 4	No of staff-months: 40 man months per year over 10 years	Professional staff provided by our firm (profiles): Project manager, municipal engineer, civil engineer, sanitation and waste disposal engineer, economist
Associated consultants: Halufa & Kehat		No of staff-months provided by associated consultants: 5
<p>Detailed Narrative Description of the Project: For the last 15 years, ROM has served as main consultant to the Israeli Ministry of Interior, with respect to the allocation of its development budget to all municipalities in the country. The average annual development budget of the Ministry is around US\$300 million. The Ministry has to allocate this budget among 245 municipalities, based on several criteria including: professional priorities and economic viability of the proposed projects, financial strength of the municipality, its ability to implement the projects, and the statutory availability of the projects.</p>		
<p>Description of Services provided by ROM: ROM has prepared technical guidelines for the Ministry, according to which municipalities have to prepare their annual development budget. The guidelines instructed the municipalities how to prepare a multi-year master plan, and how to set priorities in different areas of development, including:</p> <ul style="list-style-type: none"> •Infrastructure development and maintenance •Public buildings and structures •Purchase and renewal of vehicle, sanitation and cleaning equipment •Development of open areas, parks and beaches •Information technology (for example central computer system) •Compatibility of proposed project with guidelines •Evaluation of project priority, soundness of engineering design and cost estimate •Financial resources available for the project <p>In addition to providing engineering services, ROM assisted the Ministry to identify possible financial resources for the project, for example dedicated fees and privatization schemes.</p>		

Jerusalem Roads Development Plan

Multi-Year Development Plan for Roads and Crossroads in Jerusalem

Assignment Name: Multi-year Development Plan for Roads and Crossroads in Jerusalem

Country: Israel

Location within Country: City of Jerusalem

Name of Client:

Ministry of Transport and the Municipality of Jerusalem. Ministry of Transport, Government Center, Kiryat Ben-Gurion, Jerusalem, Israel

Contact Person: Alex Langer, Deputy Director, Ministry of Transport, Jerusalem, Israel. Tel. +972-2-6663100

Financing Agency: MOT

Start Date:
October 1998

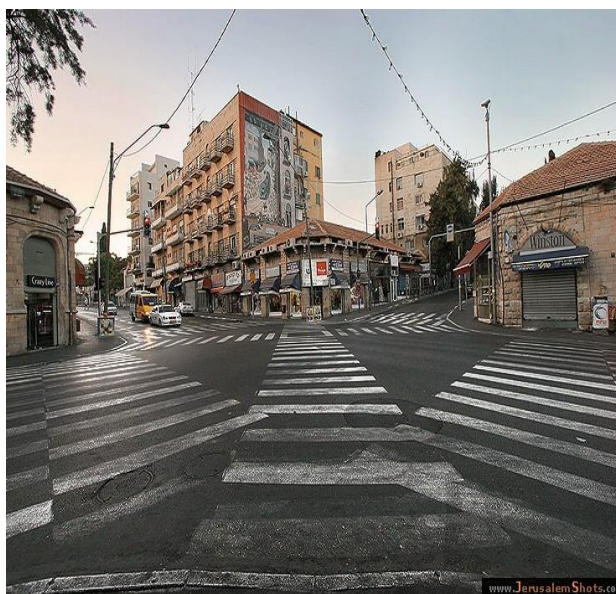
Completion Date:
2000

Associated consultants: Various

Approx. Value of Services:

Professional staff provided by our firm (profiles):

Traffic engineer, public transport planner




Detailed Narrative Description of the Project:

ROM presented the Jerusalem Municipality and the Ministry of Transport with a 5- and 10-year investment plan to develop transportation infrastructures. The plan was based on traffic forecasts for the next 10 and 20 years, and used state-of-the-art transportation planning tools. Economic feasibility studies, which were based on traffic forecasts and cost assessments following preliminary design by ROM's engineers, were used to determine investment priorities. The development plan is currently under implementation, following financing approval by the Ministry of Finance.

Description of Services provided by ROM:

- Full project management
- Financial analysis
- Demand analysis including the development of full disaggregate mode-choice model
- Local engineering design

Jerusalem Parking Policy

Developing a Parking Policy for Jerusalem		
Assignment Name: Developing a Parking Policy for Jerusalem		
Country: Israel		
Location within Country: City of Jerusalem		
Name of Client: Ministry of Transport and the Municipality of Jerusalem. Ministry of Transport, Government center, Kiryat Ben-Gurion, Jerusalem, Israel Contact Person: Alex Langer, Deputy Director, Ministry of Transport, Jerusalem, Israel. Tel. +972-2-6663100		
Financing Agency: MOT		
Start Date: October 1998	Completion Date: 1999	Approx. Value of Services:
Associated consultants:		No of staff-months provided by associated consultants:
Detailed Narrative Description of the Project: ROM presented the Jerusalem Municipality with a comprehensive plan to manage street parking in the city. The plan created higher parking availability by limiting maximal parking time, introducing advanced payment and control technologies, and enhancing efficient working procedures in the municipal parking authority.		
Description of Services provided by ROM:		