NESPAK IN *Sultanate of Oman*

NESPAK has entered the 41st year of its glorious existence in the Sultanate of Oman. NESPAK established its regional office in Muscat, Sultanate of Oman, in 1980 after it started work on its first project titled “Al-Khabura to Dariz Road Project” awarded by the Sultanate's Ministry of Transport and Communications.

With the passage of time, NESPAK has emerged as a reliable consultancy organisation by showing good performance in the development of infrastructure facilities in the Sultanate. NESPAK has contributed a lot to the economic and social development of the Sultanate by dint of the Company's state-of-the-art services for its infrastructure through various projects.

During the last 40 years of operations in Oman, NESPAK acquired 188 projects costing over US$ 9 billion in the Highways & Transportation, Environmental & Public Health Engineering and Water Resources Development sectors.

Portfolios of some of major projects undertaken by NESPAK in the Sultanate of Oman are given in the following pages.

Al-Batinah Coastal Road

Project Status: Completed in 2014
Scope of Services: Detailed Design, Tender Documents, Construction Supervision
Project Cost: US$ 710 million
Client: Supreme Committee for Town Planning and Directorate General of Roads & Land Transport Ministry of Transport, Oman

The project comprised the construction of 245 km long Al-Batinah Coastal Road under the supervision of NESPAK. It involved a new four-lane facility located at the north part of Sultanate of Oman in the Al-Batinah region between Muscat. The Al-Batinah Road starts about 700m from Naseem Garden near Barka roundabout and terminates at the border of Khatmat Malaha. The project includes main carriageways, services roads, link roads, bridges, two interchanges, a flyover, several roundabouts, drainage structures and provision of streetlights.

Sohar-Buraimi Road

Project Status: Completed in 2012
Scope of Services: Detailed Design, Tender Documents, Construction Supervision
Project Cost: US$ 136 million
Client: Ministry of Transport & Communications, Oman

The 80 km long carriageway is an important link between the Sultanate of Oman and the United Arab Emirates (UAE) and carries inter-regional and cross-border traffic from Sohar Port to Buraimi and Al-Ain City and other UAE states. The project comprised the construction of an additional carriageway, 18 new bridges, two underpasses, an interchange to connect the new seaport, service roads and cross drainage structures. The project also entailed the rehabilitation of the existing Sohar-Buraimi Road. With the dualisation of this key road, there has been marked improvement in the mobility of traffic and reduction of accidents.

Salalah-Thumrait Road

Project Status: Completed in 2002
Scope of Services: Detailed Design, Tender Documents, Construction Supervision
Project Cost: US$ 131 million
Client: Ministry of Transport & Communications, Oman

The 74 km long Dualisation of Salalah-Thumrait Road Project involved the rehabilitation of the existing carriageway and the construction of an additional parallel carriageway, two roundabouts, six underpasses and several service roads. The Salalah-Thumrait Road is located in the Ad Dhofar Region which is known for heavy monsoon rains. The Region attracts a large number of tourists from all over the Gulf during the months of June and July. With the dualisation of this road, the journey has become safe and travel time is also reduced.

Nizwa-Thumrait Road

Project Status: Completed in 2006
Scope of Services: Detailed Design, Tender Documents, Construction Supervision
Project Cost: US$ 103 million
Client: Ministry of Transport & Communications, Oman

NESPAK supervised the rehabilitation of Nizwa-Thumrait Highway which links Ad Dhofar Governorate with the rest of the Sultanate of Oman through the central region. The

project's completion has improved land transportation between the southern and northern parts of Oman by upgrading the existing road (built in the early 80s) to a modern road network.

Ibri-Ad Dariz-Miskin Road

Project Status: Completed in 2015
Scope of Services: Detailed Design, Construction Supervision
Project Cost: US$ 92 million
Client: Ministry of Transport & Communications, Oman

This project involved dualisation of 34 km long section of the Ibri-Ad' Dariz-Miskin Road located in Wilayat Ibri, Sultanate of Oman. The construction of an additional carriageway, 25 km long service roads, seven roundabouts, eight Irish bridges, 29 box culverts, a vehicular underpass & four pedestrian underpasses and the rehabilitation of the existing road were the main components of the project.

Sohar Interchange Project

Project Status: Completed in 2017
Scope of Services: Detailed Design, Tender Documents, Construction Supervision
Project Cost: US$ 67 million
Client: Ministry of Transport & Communications, Oman

This project consisted of construction of an interchange in place of roundabout in Wilayat of Sohar on the Batinah Highway, including service roads, pedestrian underpasses,

taxi stands and bus bays. The project scope also comprised expropriation of properties, relocation/ protection of services, road lighting works and traffic signals. Completion of this 8km project has mitigated traffic congestions in the Sohar area and eased the movement of traffic approaching/passing through the city.

Batinah Highway Project

Project Status: Completed in 2009
Scope of Services: Detailed Design, Tender Documents, Construction Supervision
Project Cost: US$ 56 million
Client: Ministry of Transport & Communications, Oman

The project included the rehabilitation works for the 276 km long Batinah Highway which is the busiest primary road of Oman passing through the main population centres and linking the Sultanate of Oman with the UAE.

Some additional works were also awarded to NESPAK which comprised the rehabilitation/reconstruction of 181 culverts on the Barka-Rustaq Road, one underpass, two roundabouts, upgradation of inner shoulders (231 km) and 13 km long link roads.

Khasab Coastal Road

Project Status: Completed in 2000
Scope of Services: Detailed Design, Tender Documents, Construction Supervision
Project Cost: US$ 36 million
Client: Ministry of Transport & Communications, Oman

Located in the Governorate of Musandam, Sultanate of Oman, this 40 km long road project comprised the construction of 7m wide carriageway with 1.5m wide shoulders on its both sides. The Khasab Coastal Road has a unique combination of the coastal environment and steep face rugged mountains. The project road was designed with some of its sections going directly along the sea while the other sections were constructed over rugged mountains with cliff-like ridges. The embankments on the coastal side were provided with specifically designed revetment stone protection layer against sea wave/tidal action.

Improvement of Main Road at Duqm

Project Status: Completed in 2018
Scope of Services: Detailed Design, Tender Documents, Construction Supervision
Project Cost: US$ 34 million
Client: Special Economic Zone Authority, Duqm

The project site is located in the Town of Duqm, Al-Wusta Governorate, Oman. The 6.5 km long dual carriageway consists of service roads, roundabouts, intersections, culverts and parking areas. Other features of the road included road improvement with corridors for utilities, streetlighting & drainage systems, electrical,

telecom, water distribution networks, sewerage & irrigation systems and landscaping. The Road at Showroom Zone Airport Duqm Phase-I has also been constructed as part of this project.

Rustaq-Miskin Road

Project Status: Completed in 2006
Scope of Services: Detailed Design, Construction Supervision
Project Cost: US$ 29 million
Client: Ministry of Transport & Communications, Oman

This important project was a challenging task for NESPAK due to its location in the mountainous terrain. The 76 km long road connects Ad Dhahirah Region with the Batinah Region and provides a vital link for inter-regional trade, commerce and tourism in the Sultanate of Oman. The road was 7m wide with 1m paved shoulders on its both sides. The project also includes numerous cross drainage structures including bridges, culverts and Irish crossings.

Sohar Port to Ad Dhahirah Region Road

Project Status: Completed in 2006
Scope of Services: Detailed Design, Construction Supervision
Project Cost: US$ 25 million
Client: Ministry of Transport & Communications, Oman

The construction of 53 km long road connecting Sohar Port with the Ad Dhahirah Region was completed under NESPAK's supervision. The design and construction of the road posed a big challenge to NESPAK due to the mountainous terrain and several Wadis along the alignment. The 7metres wide road having paved shoulders on both sides serves as a vital route for inter-regional trade, commerce and tourism in the Sultanate of Oman. The cross drainage structures include bridges, pipe & box culverts and Irish crossings.

Mulladah-Al-Hazm Road

Project Status: Completed in 2011
Scope of Services: Detailed Design, Tender Documents, Construction Supervision
Project Cost: US$ 24 million
Client: Ministry of Transport & Communications, Oman

The dualisation of 24 km long Mulladah Al-Hazm Road project involved the construction of an additional carriageway, the rehabilitation of the existing road, three roundabouts, three underpasses, streetlighting systems and service roads. The road was dualised up to Rustaq connecting it further to the Ad Dhahira Region through a single carriageway. The Government of Oman has highly appreciated the quality of work carried out by NESPAK.

Roads in Liwa & Shinas Wilayats

Project Status: Completed in 1993
Scope of Services: Detailed Design, Tender Documents, Construction Supervision
Project Cost: US$ 23 million
Client: Ministry of Transport & Communications, Oman

These roads are located in Liwa Wilayat between Wadi Bani Umar Gharbi and Wadi Fizh and in Shinas Wilayat between Wadi Bani Umar and Wadi Hatta in the Gulf of Oman along the Batinah Coast. These internal roads connect various settlements of both Wilayats with the dual carriageway of the Batinah Coastal Highway.

The project comprised the construction of roads, service roads, roundabouts, landscaping of surrounding areas, provision of streetlighting and parking areas around the government buildings.

Sohar Roads Project

Project Status: Completed in 1987
Scope of Services: Detailed Design, Tender Documents, Construction Supervision
Project Cost: US$ 21 million
Client: Ministry of Transport & Communications, Oman

The project roads are located 225 kilometres from the Capital Muscat. The project comprised the construction of service roads, roundabouts, intersections, landscaping and the provision of streetlighting in the coastal city of Sohar. These roads traverse flat/desert/Wadi areas including coastal terrain. NESPAK also provided consultancy services for the internal roads of His Majesty's Palace in Sohar.

Ad Duqm-Al-Kahil Road

Project Status: Completed in 2003
Scope of Services: Detailed Design, Tender Documents, Construction Supervision
Project Cost: US$ 18 million
Client: Ministry of Transport & Communications, Oman

The 196 km long road project is located in the Al-Wusta Region. The project was aimed at providing a road connection to other parts of the Sultanate of Oman. The cross-section of the project road is 7 metres wide single carriageway and 2 metres wide shoulder on either side of the road. The normal thickness of the pavement was 50 mm bituminous base course over granular sub-base course. The project comprised drainage structures including box & pipe culverts and Irish crossings.

Wadi Dayqah Dam

Project Status: Completed in 2009
Scope of Services: Detailed Design, Tender Documents, Construction Supervision
Project Cost: US$ 290 million
Client: Ministry of Regional Municipalities & Water Resources, Oman

The highest dam of Oman, Wadi Dayqah Dam, is located near the village of Mazara, 60 kilometres to the south and southeast of Muscat in Al-Hajar, Ash Sharqiyah Region. The project was aimed at supplying water to Muscat, Mazara, Hayl-al-Ghaf, Daghmar and adjoining areas in Quriyat and Muscat Governorate.

The 390-metre-long storage dam with a height of 75 metres and a 100 million cubic-metre (mcm) storage capacity would provide about 35 mcm of water a year: around 10 mcm for villages down the Wadi stream for agricultural purposes and around
5.7 mcm and 19.3 mcm for drinking and domestic use.

Al-Jufainah Flood Protection Dam

Project Status: Ongoing
Scope of Services: Design, Review, Construction Supervision
Project Cost: US$ 115 million
Client: Ministry of Regional Municipalities & Water Resources, Oman

NESPAK won consultancy contract for Flood Protection Dam Project in Wadi Al-Jufainah in the Muscat Governorate of the Sultanate of Oman in 2015.
The project features a 30-metre high and 2.46 kilometres long plastic concrete core earthfill dam with gross storage capacity of 16 million cubic metres. The first task of the project i.e, review of the design is successfully accomplished and design review report has been submitted to the Client.

Duqm Town Infrastructure Facilities Development Project

Project Status: Ongoing
Scope of Services: Planning, Design, Construction Supervision
Project Cost: US$ 621 million
Client: Special Economic Zone Authority, Duqm, Oman

NESPAK was entrusted by the Special Economic Zone Authority at Duqm (SEZAD) to provide consultancy services for water supply, sewerage, Sewage Treatment Plant, stormwater drainage, roads, underground electrification systems and landscaping in the Town of Duqm.

According to land-use master plan, the project area has been divided into four zones i.e., Residential Phase-I, Residential Phase-II, Light Industries and Showrooms & Utility Services encompassing total area of about 1888 hectares of land.

Sewerage Network & Sewage Treatment Plant, Buildings & Access Road for Al-Musannah Wilayat

Project Status: Ongoing
Scope of Services: Detailed Design, Tender Documents, Construction Supervision
Project Cost: US$ 143 million
Client: Oman's Ministry of Regional Municipalities & Water Resources/Haya Water (Oman Wastewater Services Company)

The project encompasses 67970m Sewerage Network, 8000m force main, 2000 house connections, Sewage Pump Station and a 4000 m^3/day capacity Sewage Treatment Plant with extended aeration activated sludge process in the Wilayat (town) of Al-Musannah.

The components of Sewage Treatment Plant include primary treatment, secondary/biological treatment & tertiary treatment systems, utilities & services, buildings etc. The quality of effluent, which will be used for irrigation of green belts and roundabouts, shall comply with Oman national standards.

Nizwa Sewage Treatment Plant & Sewerage System

Project Status: Completed in 2009
Scope of Services: Project Planning, Detailed Design, Tender Documents, Construction Supervision
Project Cost: US$ 36 million
Client: Ministry of Regional Municipalities & Water Resources, Oman

This rehabilitation and upgradation project involved unplasticised polyvinyl chloride (UPvC)/high density polyethylene (HDPE) sewer pipeline of 200 mm to 500 mm dia, ductile iron force mains of 150 to 500 mm dia, three sewage pump stations and five sewage lift stations, a sewage treatment plant of 5,600 cu. m/day capacity based on extended aeration process. The submerged membrane filtration system was used for the first time in this sewage treatment plant in the Sultanate of Oman.

Al-Buraimi Sewage Treatment Plant & Sewerage System

Project Status: Completed in 2009
Scope of Services: Detailed design, Tender Documents, Construction Supervision
Project Cost: US$ 29 million
Client: Ministry of Regional Municipalities & Water Resources, Oman

The purpose of this project was to upgrade and rehabilitate the existing Sewage Treatment Plant (STP) and design of Sewage Collection System at Al-Buraimi. The 3000 cu. m/day capacity STP based on extended aeration process was meant to treat the sewage carried through the collection system comprising 4 km main and 25 km lateral sewers, lift station and 8 km pumping main.

Duqm Integrated Waste Treatment, Storage & Disposal Facility Project

Project Status: Completed in 2017
Scope of Services: Design Review, Construction Supervision
Project Cost: US$ 20 million
Client: Special Economic Zone Authority, Duqm, Oman

NESPAK rendered consultancy services for this project located in the Duqm Special Economic Zone in the Sultanate of Oman. The scope of work included construction of municipal and industrial waste landfills, facility buildings, road network, wheels wash area, weighbridge etc. The venture additionally includes treatment, reusing and transfer of normal and unsafe strong waste; taking care of reusing and transfer of wastewater; sewage treatment; arranging and the board of water supply to homes and enterprises just as the creation of significant vitality from waste.

Sur Sewage Treatment Plant & Sewerage System

Project Status: Completed in 2010
Scope of Services: Detailed Design, Tender Documents, Construction Supervision
Project Cost: US$ 11 million
Client: Ministry of Regional Municipalities & Water Resources, Oman

The objective of this project was the upgradation and rehabilitation of the existing Sewage Treatment Plant (STP) and design of the Sewage Collection System. The 1400 cu. m/day capacity STP is based on extended aeration process to treat the sewage carried through the collection system comprising 3 km main and 26 km lateral sewers, two lift stations and 3 km pumping main.

Khasab Sewage Treatment Plant & Sewerage System

Project Status: Completed in 2013
Scope of Services: Detailed Design, Construction Supervision
Project Cost: US$ 8 million
Client: Ministry of Regional Municipalities & Water Resources, Oman

NESPAK was engaged for providing consultancy services to upgrade and rehabilitate Sewage Treatment Plant (STP) and Sewerage System at Khasab City in an exclave of Oman bordering the United Arab Emirates. The project included 200 mm and 400 mm diametre gravity sewer pipelines of 49 km length, 250 and 75 mm dia, 7.4 km long ductile iron force main and 2625 house connections, demolition and removal of existing septic tanks, construction of valve chambers, thrust blocks, sewage pump stations and sewage lift station. The construction of a new STP with 1700 cu.m/day capacity was also part of the project.

Misfat Al-Abreen Sewage Treatment Plant & Sewerage System

Project Status: Completed in 2013
Scope of Services: Detailed design, Tender Documents, Construction Supervision
Project Cost: US$ 3 million
Client: Ministry of Regional Municipalities Environment & Water Resources, Oman

NESPAK rendered consultancy services for Sewage Treatment Plant (STP) and Sewage Collection System at the Misfat Al-Abreen village in Al-Hamra Wilayat in the Sultanate of Oman. This 250 cu. m/day capacity STP is based on extended aeration process to treat the sewage carried through the collection system comprising 3 km main & 2 km lateral sewers, 5 lift stations and 2.5km pumping main.

Al-Musannah Water Distribution Network

Project Status: Completed in 2012
Scope of Services: Construction Supervision
Project Cost: US$ 46 million
Client: Public Authority for Electricity & Water, Oman

NESPAK provided consultancy services for the Water Distribution Network in Al-Musannah Wilayat, Sultanate of Oman. The project involved the laying of ductile iron pipes with the fittings of about 52 km length and HDPE pipes with the fittings of about 550 km length, having diametres ranging from 100 mm to 700 mm.

Shinas & Liwa Water Supply Schemes

Project Status: Completed in 1997
Scope of Services: Detailed Design, Tender Documents
Project Cost: US$ 25 million
Client: Ministry of Electricity & Water, Oman

This project was aimed at supplying water to the Wilayats of Shinas and Liwa in the North Al-Batinah Region, 300 km from Muscat, the capital of Oman.

The town of Shinas is bordered with the town of Liwa and the source of water was four wells/boreholes located in the Nabar area of Liwa along the main highway. Water was pumped from wells/boreholes to ground reservoirs at four Booster Pump Stations (BPSs). The water was further transmitted from ground reservoirs to elevated tanks located at the BPSs and the distribution network was fed by these tanks.

Sohar Water Distribution Network

Project Status: Completed in 1999
Scope of Services: Project Planning, Detailed Design, Tender Documents
Project Cost: US$ 24 million
Client: Ministry of Housing, Electricity & Water, Directorate General of Water, Oman

NESPAK rendered consultancy services for the construction of a water distribution system for the residents of Falaj, Ab-Qabil/Majis, Mala Ab-Sanqab and Al-Multaqa/Al-Qufrab in Sohar, the capital of the Al-Batinah North Governorate, Oman The project involved the preparation of design of the water supply distribution network including pump houses, ground reservoirs, elevated tanks, guard room etc.

Water Distribution Networks for Nakhal, Awabi & Wadi Al-Maawil Wilayats—Phase-I

Project Status: Completed in 2020
Scope of Services: Design Review, Construction Supervision
Project Cost: US$ 23 million
Client: Public Authority for Water, Oman

The purpose of this project was to construct Water Distribution Network for Nakhal, Awabi and Wadi Al-Maawil Wilayats in Al-Batinah Region to improve water

supply services. The scope of work included installation of HDPE pipes with outside diametre varying from 63 mm to 355 mm (246.18 km) and ductile iron pipes of diametres DN 400 & DN 500 (10.25 km) including all fittings, isolation valve chambers, washout chambers, air valve chambers, fire hydrants etc.

Development of Seeb & Salalah Airports

Project Status: Completed in 2010
Scope of Services: Design Review, Construction Supervision
Project Cost: US$ 1 billion
Client: Ministry of Transport & Communications, Oman

NESPAK in association with Airport de Paris Ingénierie (ADPi) of France won Seeb and Salalah International Airports Expansion Project in Oman through an international bidding competition in 2006. The Seeb International Airport expansion, which was completed in 2010, included a new passenger terminal building, a new VVIP terminal, a cargo terminal and a new runway. At the Salalah International Airport, a new passenger terminal, cargo terminal and associated infrastructure was constructed.

Social Housing Project

Project Status: Completed in 1985
Scope of Services: Master Planning, Detailed Design, Tender Documents
Project Cost: US$ 13 million
Client: Ministry of Social Affairs & Labour, Oman

This project comprised more than 200 standard single-storey houses planned as settlements on a plot of 400 sqm each at different locations in Northern Oman. Each settlement was a small community comprising traditional courtyard type houses, mosque and shops along with other facilities like playgrounds and parking places. Allied infrastructure facilities i.e., roads, water supply, sewerage drainage and electricity were also provided for the project.