

INFRASTRUCTURE EXPERTISE

THOUGHT LEADERSHIP FOR THE BUILT ENVIRONMENT



A TRUSTED NAME IN MEGA DEVELOPMENT

When it comes to delivering iconic projects that require a meticulous level of planning and development, Alpin prides itself in standing out. From mega-ports, masterplans, airports and metro stations, to stadia, train stations and road networks, our name has become synonymous with the realization of major infrastructure in the region. High-level developments such as these require long-term planning and commitment, and the ability to scale operations to meet complex requirements. Our teams excel at this challenge. Proof of this is our portfolio, which includes more than \$25 billion worth of infrastructure projects. In addition to four international airports and five major metro networks.

THE ALPIN APPROACH

Such mega projects command a lengthy commitment - sometimes 3, 4 or 5 years plus. With this also comes the need for intricate planning, and a team with a superior level of experience in dealing

with the multi-layered challenges of large-scale developments. While other teams may change or come and go, we remain in place, and have the software and tools to ensure the seamless transfer of data and management right throughout a project's entire duration.

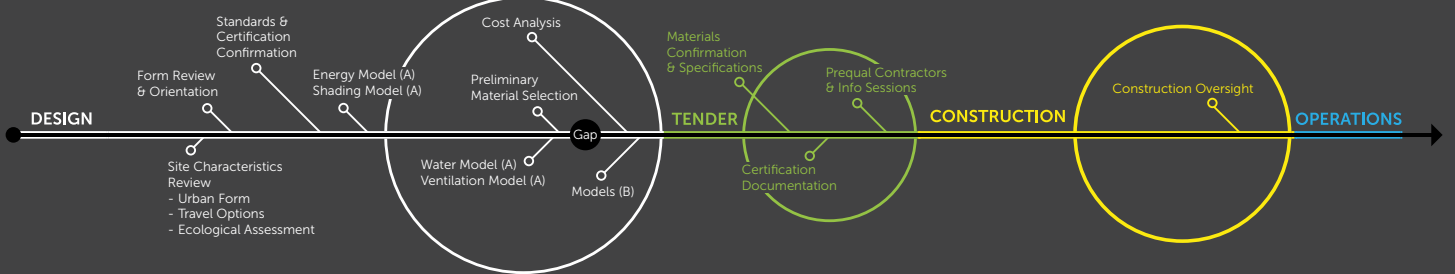
With most of these mega projects backed by government funding, we pride ourselves in having strong working relationships with many of the region's major infrastructure players; for example, DEWA and the RTA in Dubai, ADWEA, ADAC and Musanada in Abu Dhabi, GACA in Saudi Arabia and Ashghal in Qatar. Our experience in co-ordinating with important government entities such as these ensures that the projects we are involved in run smoothly and adhere to even the most stringent of time scales.

Alpin has also been chosen for involvement in a large number of Public Private Partnerships or PPPs, due to our high level of expertise across so many

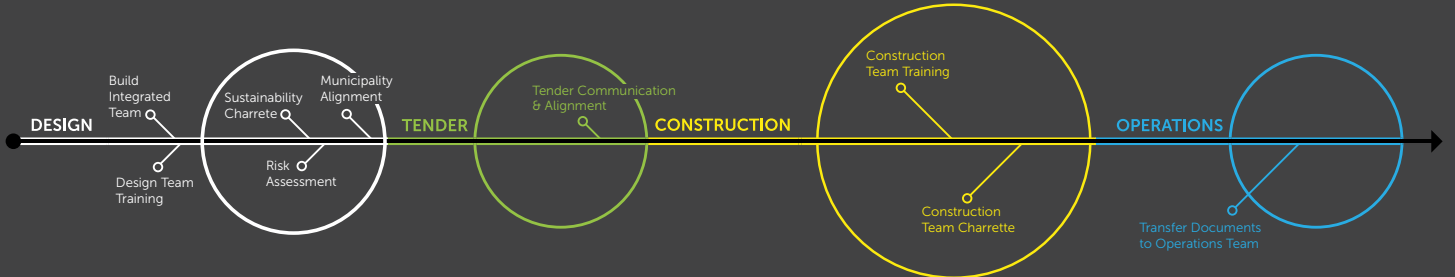
difference sectors. The PPP way of working has gained renewed focus in the GCC and worldwide due to its ability to reduce operating costs, by turning maintenance and operating responsibilities over to a private party. Alpin prides itself again in maintaining long-term relationships with a number of public service entities, a factor that is crucial to the success of a PPP.

Above all our clients - from designers to high profile contractors, project managers, consultants and government bodies - rely on our expertise in BIM, Commissioning, Sustainability and so much more to produce outstanding results. By optimizing systems and using the most cutting edge technology and software available, we can visualize the end result, pre-empt any possible challenges, reduce construction costs and wastage and ultimately deliver iconic projects that the region can be proud of.

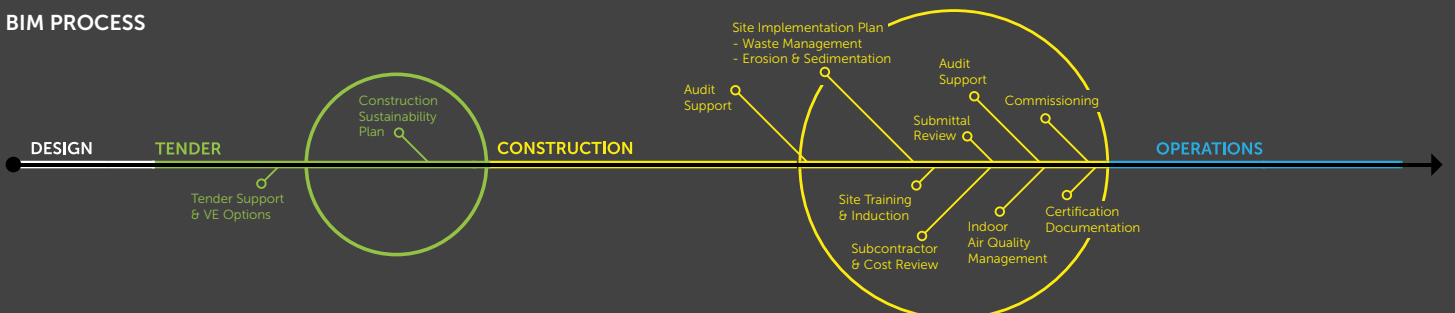
SUSTAINABLE DESIGN



COMMISSIONING



BIM PROCESS



INFRASTRUCTURE SERVICES

"...chosen for involvement in a large number of Public Private Partnerships or PPPs, due to our high level of expertise across so many difference sectors."



INFRASTRUCTURE PROJECT SERVICES:

CxA Commissioning

We understand that developing mega-infrastructure projects is a major undertaking, both financially and in terms of time. Our commissioning services ensure that all major equipment and processes used are fully optimized to help lower construction costs and produce outstanding results.

BIM

We use sophisticated BIM software (Bentley and Autodesk) to model, document and visualize even the most complex of infrastructure projects. Our tools bring mega-developments to life long before work on site has begun, allowing for a more logical and highly cost effective design and construction process. This is vital when dealing with mega-infrastructure assets, which need to be meticulously mapped out, managed and maintained for decades to come.

LEED GBD+C, Neighborhood Development and Estidama Certification

Our certification service ensures developments, infrastructure and communities are sustainability designed and meet green building objectives where necessary, therefore reducing the overall impact of the built environment on human health and the natural environment. We work under several regional, national and international certification systems to achieve these goals.

INFRASTRUCTURE PROJECTS IN FIGURES

4 Major international airports

5 Metro networks

7 Major masterplanned developments

25+ Billion US Dollars

100+ Million passengers served

200,000+ Residents housed

2000+ Professionals trained

Alpin is the Design Phase Authority for Dubai World Expo 2020

ALPIN IN THE PRESS

*"Alpin named design phase
commissioning authority for
Expo 2020"*

ME CONSTRUCTION NEWS

*"Alpin Limited (Masdar City)
Appointed Design Phase
Commissioning Authority for
Expo 2020 Dubai"*

– YAHOO FINANCE

INFRASTRUCTURE CASE STUDIES



In any significant infrastructure project, there are many elements that must successfully combine to ensure its success; from meeting intended operating procedures, to ensuring the entire journey is meticulously documented so that operators and national owners can take over after construction. Alpin confidently takes supports your development from design and construction, to completion and beyond.

TECHNICAL EXPERTISE

We work with superior caliber team members who have the competency, skills and experience to perform inspections, commissioning and startup at the highest of levels. Combine this with our patented technology/work flow process and you can rest assured that your infrastructure development will be ready for operations without compromise.

PROJECT MANAGEMENT

We provide the best in class team to assist in or fully define and execute independent advisory audits, commissioning, start-up and completions. We approach large-scale infrastructure projects by combining the skills of our highly experienced personnel, with a proven workflow process and standard project management tools such as BIM , Asset tagging software, Primavera and Aconex.

THE RESULT

Better project outcomes, delivered on-time at a lower cost.

INFRASTRUCTURE CASE STUDIES



AL AIN STADIUM & MASTERPLAN

AL AIN, UNITED ARAB EMIRATES

INDEPENDENT COMMISSIONING, STIDAMA-PBRS/ PCRS/ PVRS - 2 PEARL
2014-2017

Spread over an area of five hundred thousand sqms consisting of 25,000-seats football stadium, a sports center, a commercial center, a 5 star hotel offering 200 rooms and residential buildings.

Type of Project: Mixed use development

Client: AAFAQ Islamic Finance

Architect: Broadway Maylan

Contractor: BAM

Project Manager: EC Harris



DOHA METRO MAIN STATIONS (MSHEIREB + EDUCATION CITY)

DOHA, QATAR

BIM, INDEPENDENT COMMISSIONING, LEED AND GSAS
2014-2017

Alpin are engaged on seven packages over four major lines. The Doha Metro is a planned rapid transit system in Qatar's capital. It will have four lines with an approximate overall length of 300 km and 100 stations.

Type of Project: Rail

Developer: Qatar Rail

Clients: CCC, Midmac, Samsung, Socotec, TonyGee Steel



MIDFIELD TERMINAL - ABU DHABI AIRPORT

ABU DHABI, UNITED ARAB EMIRATES

BIM AND SUSTAINABILITY
2014-ONGOING

With a total build-up area of 700,000sqm, the 'X'-shaped Abu Dhabi Midfield Terminal is comprised of a 6-floor-central processor and 4 piers.

Type of Project: Aerospace

Developer: Abu Dhabi Airports Company

Client: PCE JV, Eversendai, Abanos, Beumer, CCM, China State, ASP

Project Manager: AECOM

Architect: KPF - Kohn Pedersen Fox Associates

INFRASTRUCTURE CASE STUDIES



AL ZAHIA GARDENS MASTERPLAN

SHARJAH, UNITED ARAB EMIRATES

INDEPENDENT COMMISSIONING, ENERGY MODELING, AIR TIGHTNESS TESTING, BREEM CONSULTANCY

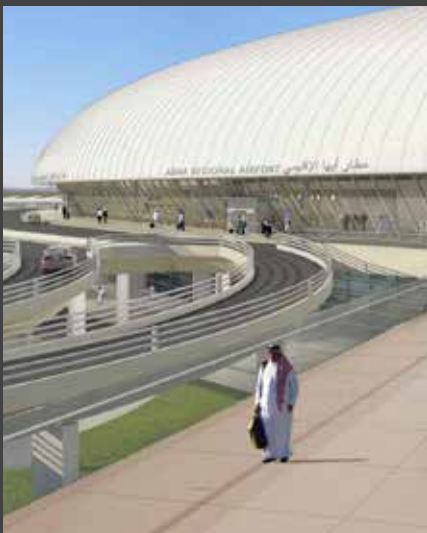
2015-2017

Al Zahia spans a total area of over 1,300,000 sqm. This large-scale community is comprehensively designed and integrated within a range of open spaces and neighbourhood parks spread across the development.

Type of Project: Mixed use development

Client: Khatib & Alami and Al Qabdah

Developer: Majid Al Futtaim (MAF) + Sharjah Holding (Govt)



ABHA AIRPORT TERMINAL

ABHA, SAUDI ARABIA

LEED PRE-CERTIFIED GOLD

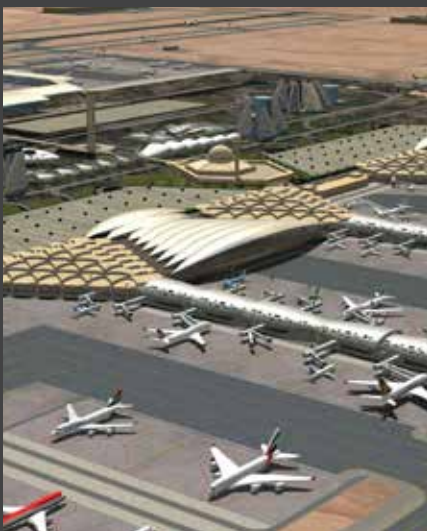
2017-ONGOING

When complete, the new terminal will feature 20 passenger boarding bridges, a new apron that can accommodate 26 planes simultaneously and a parking structure with the holding capacity for 2,800 cars.

Type of Project: Aerospace

Client: Edge-Ahmed Abdulaziz Zaidan Consultants Architects

Developer: General Authority of Civil Aviation (GACA)



KING KHALID INTERNATIONAL AIRPORT

RIYADH, SAUDI ARABIA

LEED-BD+NC V3

2015-ONGOING

The project is expected to cost more than US\$800 million (£501.6 million) and the expansion is scheduled for completion in 2019.

Type of Project: Aerospace

Client: Riyadh Airport Expansion JV

Project Manager: AECOM

Architect: Gensler

Engineer: Louis Berger

INFRASTRUCTURE CASE STUDIES



REDLINE NORTH RAILWAY LINE AND STATIONS

DOHA, QATAR

GSAS 4 STAR (CORE & SHELL), DESIGN VERIFICATION ENGINEER
2015-ONGOING

The project involves the excavation of two parallel tunnels, one in each direction, approximately 11.6 km long with an internal diameter of approximately 6.17m.

Type of Project: Mass transportation

Client: Socotec International

Developer: Qatar Rail



QIRP - GOLD LINE UNDERGROUND

DOHA, QATAR

GSAS, 4 STARS, INDEPENDENT COMMISSIONING
2017-ONGOING

The Doha Metro Gold Line is designed to support the underground transportation system in Central Doha, Qatar. More specifically, the Line extends from Ras Bu Abboud Station in the east (near Hamad International Airport), crosses Msheireb Major Station and reaches Sport City in the west (near Aspire Zone).

Type of Project: Mass transportation

Client: ALYSJ Joint Venture

Developer: Qatar Rail

CONFIDENTIAL STADIUM

DOHA, QATAR

GSAS AND LEED + 4 STARS AND LEED GOLD
2016-ONGOING

The Stadium's design draws on the rich history of Islamic architecture. The façade is characterised by triangles that form complex geometrical patterns, which appear to change colour as the sun arcs across the sky.

Type of Project: Mixed Use Development

Client: Consolidated Contractors Company (CCC)

Type: Stadium



OUR TEAM

Internationally Experienced

Our consultants have worked in nearly every region of the world. They represent five continents and between them speak eleven languages. Having lived and worked in different countries, they fundamentally understand the dynamics within and between markets. All of our consultants have hands-on emerging markets experience.

INFRASTRUCTURE TEAM LEADERS

Jourdan Younis

Managing Director (American)

Jourdan continues to build a robust consulting firm known for its commitment to quality and professionalism. Jourdan holds an MBA from London Business School and a BSc in Construction Management from California Polytechnic. He takes great pride in making a positive impact in the cleantech industry, exceeding client expectations and making Alpin a truly exceptional organization to be part of.

Rami Ghanem

Technical Operations Manager

Rami is a Mechanical Engineer who holds a Master's Degree in Building Services Engineering from Heriot Watt university Edinburgh UK with 11 years In Design, Supervision and Commissioning of Building services. He is deeply specialized in Commissioning, Energy Value Analysis, Renewable Energy Studies (Solar Cooling and Solar Heating) and has strong experience in project management and in electromechanical systems.

Nareg Oughourlian

Strategic Consultant

Nareg is a Construction Professional with a background in Mechanical Engineering who has advised developers, consultants, and contractors on the integration of sustainability in the built environment. With extensive experience in Sustainability and Commissioning for the built environment, he is leading our business unit and to leverage our value added services to partners and clients while ensuring that Alpin's core values are reflected and manifested.

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