Construction Market Intelligence

UAE | Q1 2023

JLL SEE A BRIGHTER WAY

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Contents

Is the landscape of construction changing across the UAE?

Geopolitical unrest in Europe, supply chain disruptions impacted by Covid19, and macroeconomic volatilities caused headwinds across the construction sector, which have increased construction material prices. JLL gathered market intelligence data between Q2 to Q4 2022 to evaluate current construction prospects and monitor costs within the construction sector, this included valuable data collated from UAE based contractors to understand current risks and factors impacting construction prices.

Despite these headwinds and rise in material prices the United Arab Emirates project awards value contributed 13% of the overall MENA total up to December 2022. Whilst the overall value of project awards has decreased from 2021 our market intelligence data points to a strong tender quota with an increasing volume between Q3 2021 to Q3 2022.

March 31st, 2022, saw the closing ceremony of Dubai Expo 2020 representing the end of an eight-year development period. Over 24 million visitors attended the exhibition over six-months in virtue of the rebound in travel and tourism following global Covid19 enforced restrictions. Leaving a lasting 'legacy' project – 'District 2020' will introduce a new urban experience to the city, supporting the Emirate's long-term economic development creating jobs and investment opportunities. Dubai has also unveiled the Dubai Economic Agenda – D33 which aims to double the size of the economy over the next 10 years and consolidate it's position within the top three global cities, this will include 100 transformational projects from green and sustainable manufacturing, increasing foreign trade and making Dubai a major innovation hub.

According to Emirates NBD Research, Dubai's construction sector saw a moderate performance throughout 2022, with Business activity remaining high offset against conservative new work growth; the index rose 2.2 points from November 2022 to 55.4 in December after averaging 51.0 during Q3. December's recorded index was the highest by comparison from Dubai's travel and tourism, wholesale and retail and private non-oil sector indices.

JLL's market intelligence data suggests the MENA region has improvement opportunities associated to sustainability practices within the construction sector. Data collated from market intelligence sources anticipate COP28 (to be held in Expo City, Dubai during Q4 2023) shall be a catalyst for such practices with contractors expecting an introduction of legislative changes across the Emirates.

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Statistical Overview

United Arab Emirates 2022

Following a rise in global demand, combined with economic headwinds and geopolitical tensions led to global inflation reaching an estimated 8.3% in 2022. Oxford Economics estimates inflation will reach 4.5% for the UAE as of 2022. In October 2022, the UAE government announced a federal budget expenditure of over 252 billion dirhams between 2023 and 2026, with the largest proportion, 39% allocated to the social development and benefits sector, catalysing future construction development through providing the highest levels of social welfare, healthcare, education, economic environment enhancements and investment infrastructure within the UAE.
The opening of flagship projects such as Expo 2020, Museum of the Future and planned prestigious hospitality projects drive local and international visitors supporting cultural and tourism sectors across the UAE. 2023 shall see the official opening of notable leisure projects such as Sea World situated in the UAE's capital, observing the Emirates ongoing efforts towards economic diversification through investment in such projects. The residential sector maintains it's growth stature as Abu Dhabi and Dubai saw 44,000 units delivered in 2022. The oil and gas industry is a significant contributor to the UAE's economy accounting for 30% of it's GDP and 13% of it's exports.
In 2022 the oil price averaged $100 per barrel, sustaining high oil prices for the second consecutive year and supporting GDP growth which was estimated to grow by 7% 2022, supporting a greater fiscal balance. Allowing oil producing countries like the UAE opportunities to fund economic diversification through development transformation.

Global data forecast year-on-year construction output growth for the UAE at over 3.0% driven by the development agenda and Projects of the 50 initiative, focusing on industrial, transportation and energy infrastructure aiming to attract nearly $150 billion in foreign direct investment to 2030.

3.0%
UAE Construction Output Growth AAGR 2023 - 2026

+7%
UAE 2022 GDP

$100/bbl
2022 average oil price

4.5%
2022 consumer price inflation

AED 252.3B
UAE 2023 - 2026 federal budget

44,000 keys
Residential supply stock Year-on-year change

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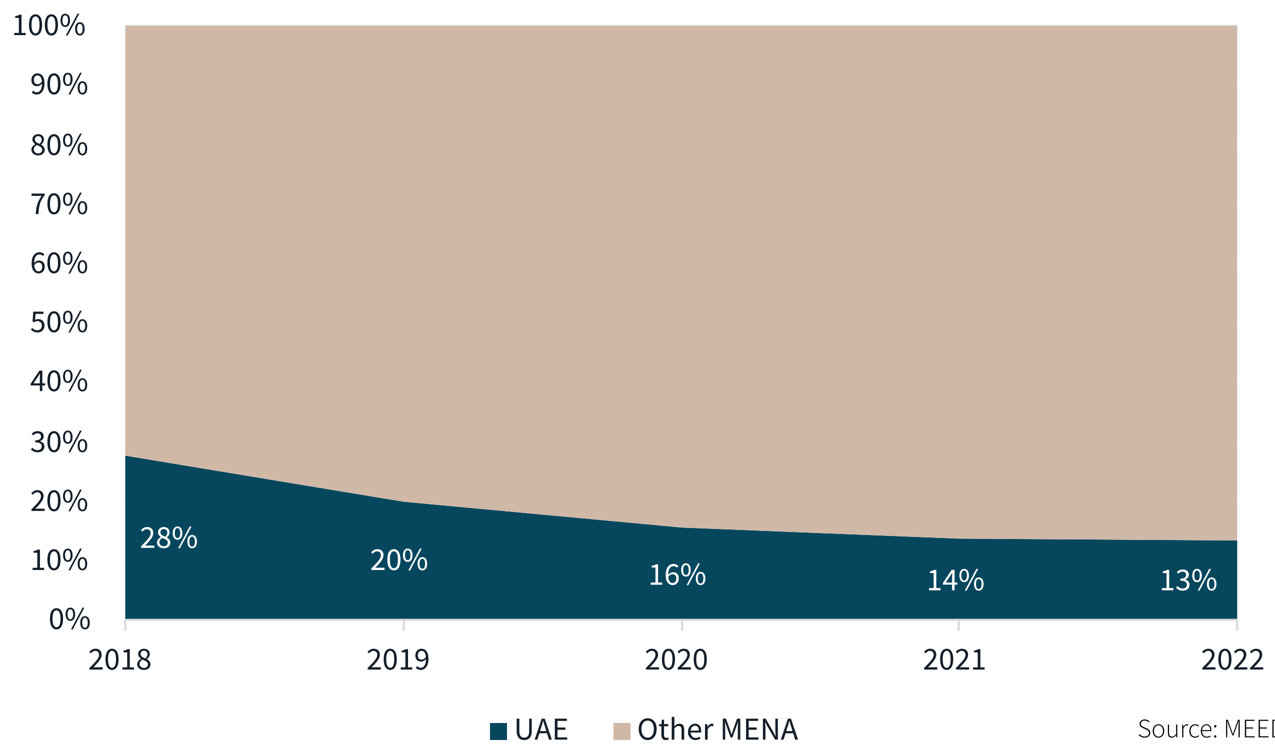
Project Awards

Value of project awards versus oil price

As tracked by MEED Projects to December 2022, the UAE held a 13% market share with a recorded $19 billion worth of project awards against an overall MENA total of $142 billion, compared to $187 billion in 2021. In the terms of value of project awards, the highest awarding sectors for the UAE are construction, transport and oil. The construction sector accounts for 60% of the value of project awards for the UAE, represented by residential, mixed-use, cultural and commercial as the leading construction sectors. Generally, the MENA region is performing well in the face of ongoing challenges across 2022 impacting economic sentiment. Oxford Economics anticipate the MENA region to be the fastest growing economy in 2022 with a Gross Domestic Product growth rate of 5%.

The rebounding oil price in 2022, triggered a fiscal surplus for oil exporting economies like UAE and KSA. In October 2022, the UAE government announced a planned expenditure of 252 billion dirhams between 2023 to 2026 continuing the governments strategic plans of economic diversification, enhancing citizens quality of life across the Emirates and centering themselves as a global business hub. Presenting the average annual oil price against the project awards value for the UAE demonstrates a historical correlation trend of increasing award values following elevated oil prices. However, the high oil price in 2022 has contributed to global inflation due to the application of oil across production processes thus resulting in higher economic activity costs. As of October 2022, OPEC+ announced oil production cuts in response to weakening global demand generated from rising interest rates and the high inflation levels, anticipating the cuts will support stabilizing oil prices for the remainder of 2022 and 2023, with a forecast average oil price of $95 per barrel.

UAE Construction Awards Market Share



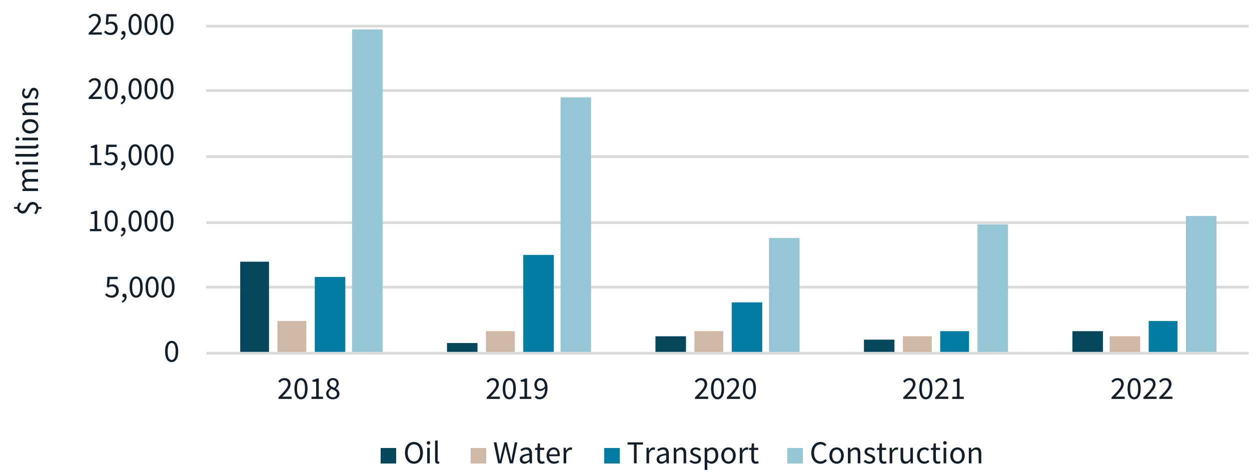
Source: MEED Projects

13%

Project Awards Pipeline

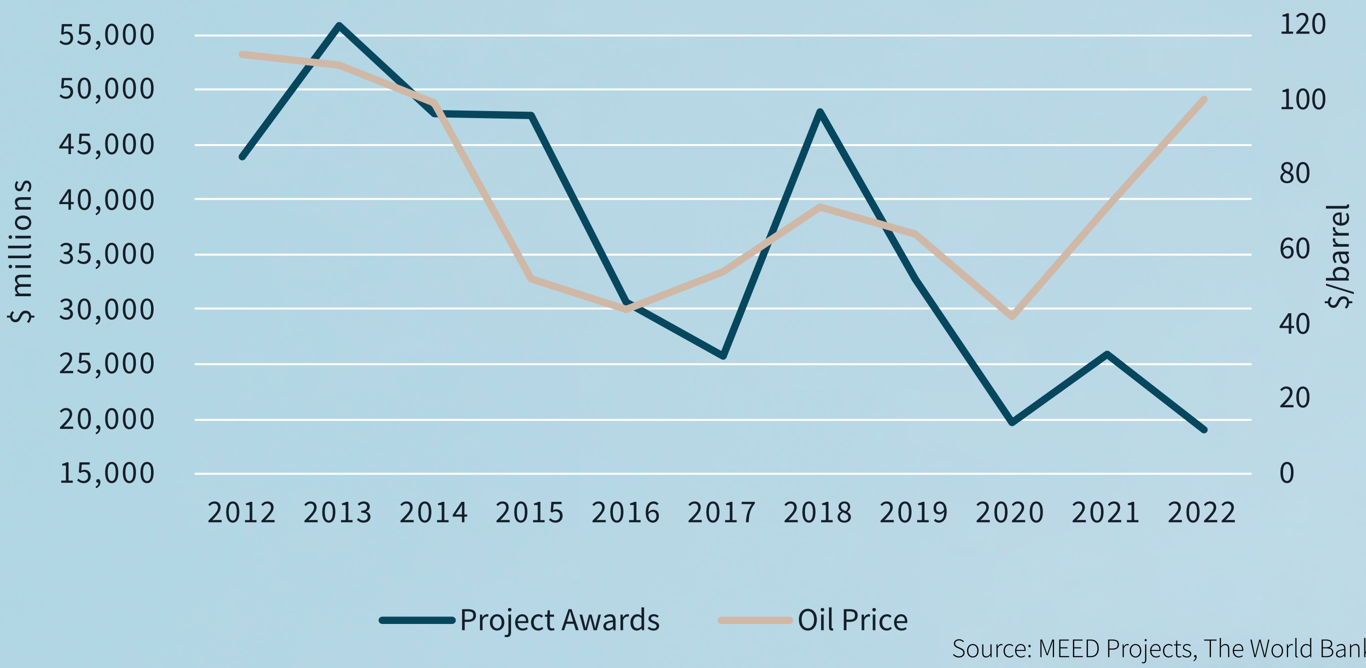
UAE 13% market share of MENA region project pipeline value

UAE Project Awards by Sector



Source: MEED Projects

UAE Project Awards & Oil Price (annual average)



Source: MEED Projects, The World Bank

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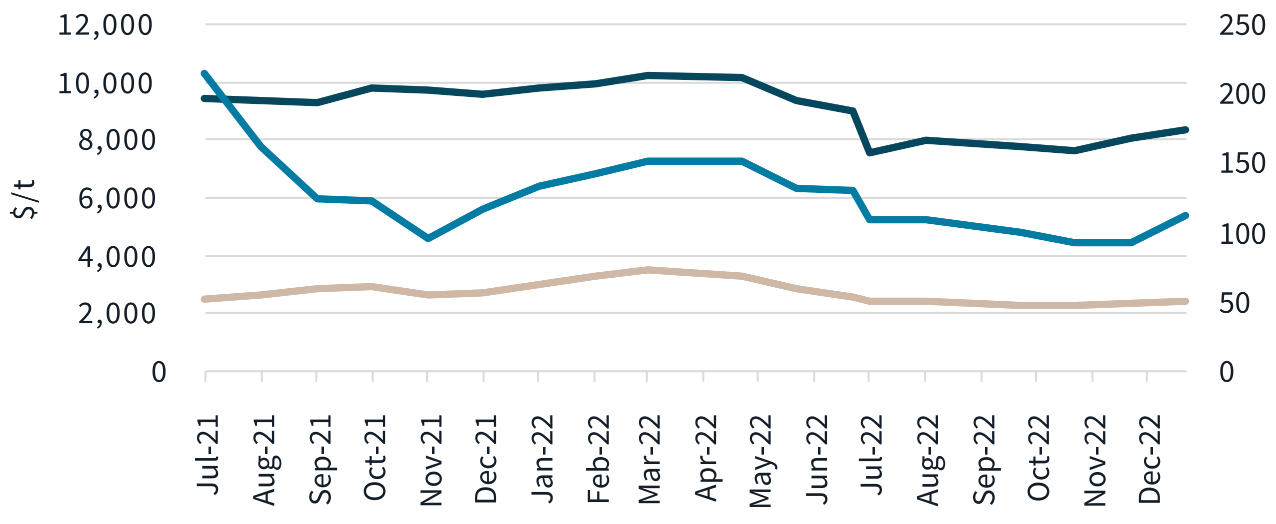
Price Watch

Geopolitical tensions in Eastern Europe, COVID 19 related lockdowns in China elevated commodity and material prices in Q2 2022. Increased demand and the supply chain disruptions led to inflated freight shipping costs. Commodity prices have since flatlined following a peak in Q2 2022, overall aluminium has declined 10% year-on-year as of December 2022 to $2,400 per tonne, copper -12% to $8,375 and iron ore by -4% to $112. However the energy crisis has sustained upturned input costs (manufacturing and production) and transportation costs as the oil price increasing to an annual average of $100 per barrel (5%) year-on-year from December 2021 correlating to higher construction prices. The supply price for Rebar peaked to AED 3,200/t in April 2022 before declining to 2,150/t as of December 2022.

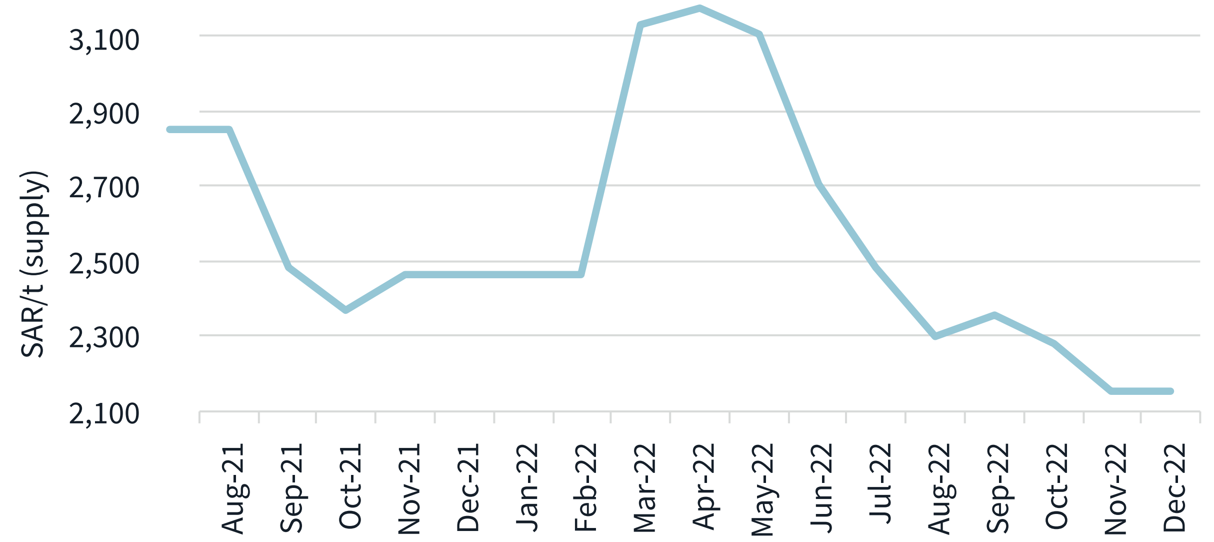
In October 2022 the World Steel Association (WSA) reduced the global steel demand forecast to -2.3% after increasing by 2.8% in 2021. The downgrade is a reflection of high inflation, rising interest rates (globally) and economic deceleration in China. Steel demand in the MENA region remains strong as JLL reports significant mission critical infrastructure demand in Egypt and substantial construction growth in KSA in line with the Gigaproject progams. Future price levels will be balanced against rising inflation, interest rates, input costs driven by the energy crisis and specific local market conditions including skilled labour shortages and rising labour costs.

Metal Commodities



Source: The World Bank

Rebar



Source: MESteel

Commodity Supply Price Movement December 2021 - 2022

Aluminium	Copper	Iron Ore	Oil Brent	Rebar
-$294	-$1,176	-$5	+$4	-$312
▼ -10%	▼ -12%	▼ -4%	▲ +5%	▼ -13%

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Market factors

JLL's market intelligence data obtained through discussions with local contractors and supply chain identified the cause and effect of global economic volatility in Q1 and Q2 2022. This created challenges within the local construction market in relation to delivery lead times and instant price increases, with suppliers reluctant to guarantee prices for extended durations. Construction materials linked to aluminum like façade systems, Rebar and MEP elements such as generators and semi conductors witnessed the greatest impact in terms of delivery shipping times and financial impact with contractors citing the need to 'micromanage' the supply chain to mitigate risks and safeguard project programs, budgets and cash flow. JLL recognized improvements between Q2 to Q4 2022 suggesting price peaks may have passed, however we believe price increases remain a significant risk due to the immediate impact economic forces can have to the construction sector, observed from trends since 2020 with contractors and developers proceeding with caution.

JLL forecast future construction costs shall be balanced against local market and global economic factors. While commodities and other construction materials prices are may be softening, the MENA construction sector is strong and reliant on construction material imports outside of the region, which in turn could attract greater costs. Globally, skilled labour demand combined with shortages within the construction sector are facilitating rising construction costs, according to the World Economic Forum (WEF) the global talent shortage reached 75% (a 16-year high) with the Real Estate sector named as one of the most difficult sectors to fill roles in. The declining freight index price, which fell 76% year-on-year from December 2021 attributed from declining global demand and easing of port congestion which in turn has improved operations. Freight shipping issues were a key risk during 2022 with contractors stating it was not only creating a delay in receiving construction materials but also a factor in rising prices. The Q4 2022 price of $2,978 /40ft container (representing a year-on year decline of 76%) should further support stabilising construction material prices.

Future construction price factors

Decreasing
- Global demand (economic deceleration in the short-term)
- Market confidence due to economic conditions (global)
- Commodity prices
- Freight (shipping) index
- MENA project awards value

Increasing
- Interest rates
- Skilled labour demand
- Fuel / energy prices (manufacturing & transportation)
- Cost of labour
- Global inflation (impacting imports)
- Experienced contractors and availability
- KSA construction sector heating up
- Concurrent Gigaproject programs
- MENA critical infrastructure (material and labour demand)

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Mitigation Strategies

Are there strategies to mitigate rising inflation, geopolitical and economic headwinds?

Mitigation strategies are high on the agenda intensified by volatile market conditions and rising construction material prices of which we saw a price peak in Q2 2022. JLL emphasizes the need for robust mitigation strategies, including a considered approach to contract execution and risk allocation. Moving forward the construction sector will focus on evolving development trends and demands with a focus on innovation and digitization. Of which shall play a significant part in the future of the construction sector in achieving the UAE's vision strategies.

1. Life cycle cost analysis
2. Risk exposure and allocating risk between construction contract parties
3. Early contractor engagement, working with employer's design team and consultants
4. Sourcing of localised construction materials
5. Appropriate construction & development budgets, consideration for risk contingencies & inflation
6. Value management studies
7. Sufficient project program's, stringent procurement / pre-qualification processes

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Benchmarking

How much are key construction rates in UAE as of 2022?

35 - 55 **Excavation & Disposal AED/m3**	12,000 – 15,000 **Structural Steel AED/t**
390 - 470 **Concrete AED/m3**	4,200 – 4,700 **Rebar AED/t**

JLL asset cost benchmarking

Sector		**Low AED/m²**	**High AED/m²**
Residential	High Rise Villas	4,200 4,700	8,400 7,900
Retail	Strip Community/Regional	3,600 4,600	4,700 6,800
Commercial	Mid Rise Office Fit Out	4,300 4,400	6,700 9,000
Car Parking	Multi Storey Basement	2,300 3,300	3,400 4,200
Public Amenities	Mosque Parks & Landscape	4,000 250	8,000 900
Hotels	**5 Star Resort (avg 220m2 GFA/ Key)** **5 Star Hotel (avg 200m2 GFA/ Key)** **4 Star Hotel (120m2 GFA/ Key)**	13,000 m2 / 2,868,000 key 10,800 m2 / 2,160,000 key 8,000 m2 / 960,000 key	18,000 m2 / 3,970,500 key 14,000 m2 / 2,800,000 key 12,000 m2 / 1,440,000 key

Definitions

Basis & Assumptions

- The m^2 area is based on GIA.
- The benchmark rates included are a range of indicative UAE construction costs based on JLL project data. Factors such as project location, contract type, contractor, building design e.g. façade type, specification level, economies of scale, building efficiency and structural solution can impact the cost.
- Low range: assumption is based on low-medium specification and verified against JLL benchmark projects.
- High range: assumption is based on medium - high specification and verified against JLL benchmark projects.
- The rates are based on traditional design and construct (Employer and Contractor), i.e. not developer.

General Exclusions

Capital contributions to third parties, tenants or authorities

Client finance costs

Local authority charges, road closures, etc.

Client insurances

Value Added Tax (VAT) & other taxes

Development management cost & expense

Marketing cost & expense

Land cost

Municipality connection cost

Master infrastructure cost

Grey & rain water recycling system

Waste management

Facility management equipment

Utilities outside the plot boundary

Developer legal fees

TV and AV system

Inflation

Professional fees

Contingencies

Retail Notes

Excludes tenant fit out.

Residential / Commercial Office Notes

Excludes loose furniture, white goods, OS&E, artwork, internal planting, active IT equipment and leasing & acquisition costs.

Hospitality Notes

Excludes loose furniture, white goods, OS&E, artwork and internal planting.

Carparking Notes

The benchmark rates are based on 35-40m^2 average parking space per bay.

Landscaping Notes

The benchmark data is a blended rate which includes hard, softscape, furniture, lighting, associated mechanical & electrical services, special features and earth works. Factors such as, volume and density, specification level and features will impact the complete AED/m^2 cost.

Material Rates

Supply and installation, fittings and equipment. Actual project rates are dependant on the specific project, site condition and procurement route they are subject to commodity price fluctuations and inflation. Bulk excavation and disposal: based on sand soil material only, excludes any work related to hard rock, contaminated material treatment and special systems to support adjacent structures. Concrete: grade 40/50, excludes admixtures and additional temperature control costs, minimum load volumes are applicable. Rebar: cut & bend costs included, grade 60 12-32mm dia bars. Structural steel: excludes fire protection coating and corrosion protection.

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In Focus

JLL speaks to the contracting market

The impact of the headwinds faced over the last two years are unprecedented and has placed immense pressure on the construction sector. The immediate impact sent shockwaves through the supply chain, causing inflated prices and severe delays on the availability of materials globally. By comparison to other Middle Eastern countries the UAE is a mature market, but this has not provided immunity to the turbulent and volatile market conditions. JLL conducted face to face meetings with local contractors in the UAE during Q2 and Q3 2022, with the aim to improve our knowledge of the impact of the headwinds, key risks and a holistic view of the construction sector in 2022 and future focus points. JLL hopes the feedback collated and shared will support future collaboration on construction projects whilst providing various parties to construction contracts a greater understanding of current challenges and cost drivers impacting construction budgets as of 2022. JLL is optimistic for the UAE construction sector as markets offer a level of comfort of price stabilisation, whilst adapting to new trends, focusing of the vision development goals and economic diversification.

(The percentages provided within the following section is calculated as a total from the market study).

What are the most impactful risks within the construction industry right now that effects business operations?

65% Highlighted price fluctuations with the supply chain declining enquiries as the most impactful risk

35% Bonding requirements

35% Reduced competency and labour shortage including gap in the market for greater supply of MEP contractors

25% Cashflow / non-payment

15% Amended construction contracts

1. The supply chain were reluctant to honour quotations and / or offer reasonable durations on prices. The price uncertainty was represented in rising construction rates and general requirements – note improvements to this as of Q4 2022

2. The market are facing issues obtaining bonds, highlighting reforms are required in contracts with a innovative approach to security due to a decline in interest from financial lenders supporting such requirements

3. Financial stability with fair and reasonable certification being a key tool in reducing the risk around negative cashflow and non-payment

What changes have you noted within the construction industry that impact how you operate as a business today compared to 10 years ago?

85%

robust bid / no bid process (becoming more risk adverse)

25%

diversifying operations outside of MEA

50%

refined business model (adapting to evolving market, mission critical projects, pushback on onerous contract conditions)

50%

diversifying operations outside of UAE but within MEA (with 40% establishing operations in Saudi Arabia)

Have contractors direct labour force increased or decreased in the last 5 years?

10%

say increased, contributed by growing operations outside of the UAE

25%

of respondents reported no change to direct labour force

65%

say decreased, with half saying between 0-50% and 25% by 50-100% (reduction)

How are you as a business ensuring your position in the market is protected following the withdrawal in the market of some very prominent contractors?

90%

stated a robust bid / no bid process

35%

stated they are establishing operations into Saudi Arabia

35%

stated they are diversifying operations outside of the Middle East (including Egypt and Europe)

50%

have implemented a revived business model focusing on mission critical projects, adapting to new market trends and declining contracts which conditions do not fit their model

As a contractor what are the main lessons learnt for you following the Covid19 pandemic? And how have you changed how you will operate as a business going forward?

- Revival on health (and safety) with a greater emphasis on worker welfare
- Collaboration within the market between contractors and client
- Risk and Force Majeure mechanisms in contracts
- Growing demand for flexible Grade A office space and supporting remote/ flexible working
- Business model: focus on collaboration and stringent go/ no go procedure, risk management through reduction of direct labour force

What sustainability demands are currently demanded from you as a contractor?

80%

of contractors say the demands have not changed or there are no demands expected from them. Stating sustainability requirements are frequently addressed during the design process, which are often Estidama or LEED focused. COP28 is anticipated to drive sustainability in construction which will be hosted in the Emirate of Dubai in 2023.

20%

of the contractors say there is an increased demand which is met through operational green protocols, the implementation of modern methods of construction, evaluating construction operations, educating and training staff, assigning an internal specialist and sourcing alternative products by supply chain evaluation.

50%

of contractors confirmed their organisations Net Zero target is by 2050

Are Clients Focused on Value for Money or Lowest Cost?

80% of contractors stated on traditional projects it's very much about lowest price, but with an increase of Design and Build and mission critical type projects coming onto the UAE market there is a likely to be an upward trend of best value with a greater emphasis on technical compliance over lower cost. They highlighted this is client specific. Contractors are aware the price has to fit a developers financial model and consistently there is pressure to align contractor's prices against the approved budget. Contractor's highlight the risk of awarding projects on lowest price under the assumption contractor's are (prequalified) technically compliant as they are on the tender list; which can attract claims during construction with a reliance on variations. With transparency of the commercial and technical scoring matrix supports contractor's through the bid proposal process.

Are contract conditions driving the price? What are client biased contract conditions in the market and what would you like to see changed?

65%

highlighted onerous bonding requirements are becoming increasingly challenging to obtain due to lack of support from banks

50%

of contractors stated they have seen improvements to contracts over the last 5 years. Whilst 25% stated they had not, with contractors unwilling to sign up to unreasonable contract conditions which negates their organisations business model

50%

raised the concern of withholding retention (up to 10%) and the challenge of receiving this at DLP with unreasonable payment terms

40%

stated alternative dispute resolution mechanisms are often written out of contracts resulting in disputes being resolved through litigation or arbitration. With termination clauses written in the client's favour, heavily amended contracts lead to unbalanced risk reward

25%

stated verbal instructions given on site are an increasing occurrence, with variations agreed outside of contract timescales with the expectation contractors have to adhere to notification timescales

25%

stated the expectation of accepting design responsibility under traditional procurement is increasing the risk for contractors

Is There a Shift Towards Design & Build Contract's in the Region

85% of contractors confirmed they are seeing a shift towards design and build procurement in the region (compared to FIDIC Redbook (traditional). With 35% stating it is their preference as they maintain control and quality of the design whilst binging their expertise to the projects. 50% highlighted that whilst D&B procurement is being used many projects still a traditional method with expectation contractors will except design responsibility. A key take away being greater knowledge within client teams so D&B procurement is used to it's greatest potential.

Over the last 2 years (or prior) all contractors have faced pressure to rationalise (reduce) preliminaries and OH+P. With feedback suggesting requested preliminaries levels are often insufficient to successfully complete the project. A greater transparency within the industry and collaboration with the client's team could assist in ensuring preliminaries are priced authentically without contractors needing to adapt pricing strategies which may lead to greater risk on the project. Contractors stated different projects attract different levels of preliminaries and what may have been the case on a certain project does not set a precedence on all construction programs.

When considering market volatility and the need to stay as commercially competitive as possible what is your approach to pricing key commodities?

50%

of contractors stated they had to raise prices and contingency to account for the increased uncertainty and risk of unprecedented market changes

65%

contractors unable to fix prices; passed on from much of the supply chain only offering short-term validity periods

Contractors were cautious and highlight the need for greater collaboration around risk. The approach to pricing can mean contractors either have to 'hedge', re-price at final agreement of the contract, or price with comfort of additional contingency

80% of contractors stated they witnessed an increase in the number of enquiries during 2022 compared to those received pre Covid19 (2019) with the majority relating to residential and data centre projects. Of the contractors we spoke to the assets the contractors were actively tendering on during 2022 were residential, data centres, hospitality and fit-out / refurbishment projects.

What are the main reasons you have in the current climate for not participating in a tender?

65%

who sent the enquiry (go/no go procedure analyses client reputation and consultant team, prioritises Government entities in busier periods)

40%

the type of project (including joint procurement, high value or proportion of provisional sums, traditional schemes where contractors can't be as competitive and clients inclination and desire to complete the building)

65%

extensive tender list (not uncommon to see 10-20 tenderers on the bidding list, with 4-6 being the optimum competition)

other

including whether the development is already sold, the contract conditions, unreasonable bid durations and availability of internal resources

During Q2 and Q3 2022 90% of contractors stated they were seeing a shortage of materials within the supply chain. 25% stated the shortage was a spill over from Covid19 disruptions or specific to certain materials could be sourced locally and avoided international disruptions.

During peak supply chain disruptions contractors had to micromanage and engage with the supply chain more than ever before. Generator lead times increased from approximately 38 weeks to 50-70 weeks, Covid19 related lockdowns in China caused severe delays to façade systems and overnight increases were witnessed to Rebar and copper cables. Shipping container costs increased to circa $10,000 / container (shipping index for 40ft container).

What materials in particular (% of respondents): 40% generators, 40% glazing and cladding, 40% Rebar and steel, 25% MEP equipment

In line with the increase in commodity prices (iron ore, copper, aluminium and oil) are relatable construction rates increasing in the same capacity?

40% of contractors said diesel was the greatest impact which increased by 200% between Q3 2021 and Q2 2022. 20% felt that the (international and local) supply chains saw an opportunity to increase prices regardless of the actual impact and 20% cited marble, timber, rebar, specialist façade systems, concrete and steel as materials which increased due to commodity price volatility.

JLL would like to thank and acknowledge the contractor organisations who contributed to the market intelligence in focus piece.

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Tender Price Inflation

How much have construction costs increased in 2022?

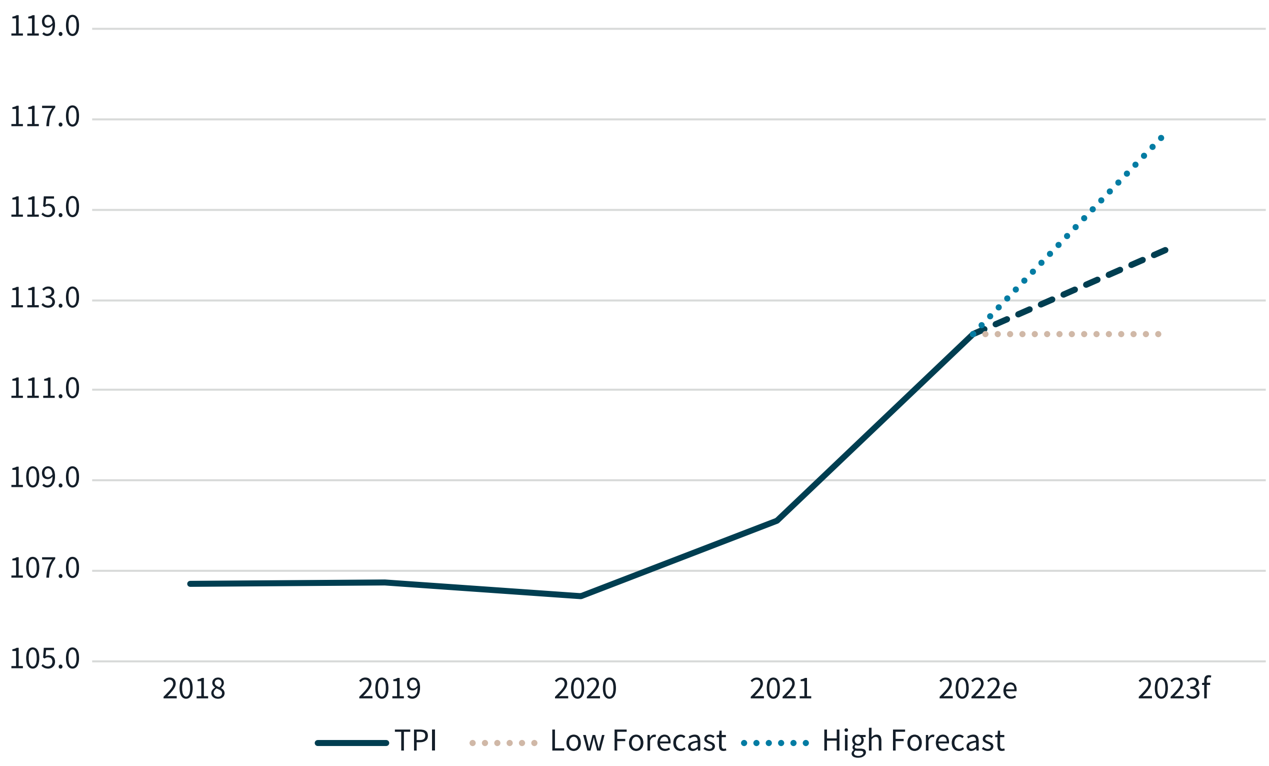
JLL estimates tender price inflation (TPI) has increased by an annual average percentage change of 3.5% in 2022. Comparable with our initial forecast of 2% to 5% led from increases during Q2 to Q3 2022. The increase is representative of market factors linked to commodity and construction material price fluctuations, evaluated from tender return cost data, market testing and commodity price trends. JLL's TPI forecast represents year-on-year growth of 2% in 2023 associated to the estimated project pipeline value correlated to future demand and JLL's intelligence gathered from market sources. The TPI graph includes a 2% low / high sensitivity factor from the midpoint TPI.

UAE Tender Price Inflation

JLL 2022

3.5%

United Arab Emirates Tender Price Indices Forecast



Disclaimer: JLL endeavours to provide a prudent tender price inflation forecast, however it is impossible to fully determine expected future financial inflation. Actual project outcomes could differ substantially from our projections and therefore no warranty is given to the accuracy of this information.

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