The information presented in this section has been derived from various official Government and industry sources. The Directors believe that the sources of this information are appropriate sources for such information and have taken reasonable care in extracting and reproducing such information. The Company and the Sponsor have no reason to believe that such information is false or misleading in any material respects or that any fact has been omitted that would render such information false or misleading in any material respects. The information has not been independently verified by the Company, the Sponsor, the Bookrunner (also in its capacity as the Underwriter), the Co-Managers, their respective advisers or affiliates or any other party involved in the Placing and no representation is given as to its accuracy, and accordingly, the information contained herein should not be unduly relied upon.

## SOURCES OF INFORMATION

The Group has commissioned IPSOS, an independent market research company, to analyse and report on, among other things, the trends of the construction industry in Hong Kong at an aggregate fee of HK\$568,000. The Directors consider that such fee reflects market rates. To provide the above analysis, IPSOS combined the following data and intelligence gathering methodology: (a) performing client consultation to facilitate the research including in-house background information of the client (such as the business of the Group); (b) conducting desk research to gather background information and to obtain the relevant information and statistics on the industry; and (c) conducting in-depth interviews including face to face, phone interviews with key stakeholders and industry experts of construction related players in Hong Kong. The information and statistics as set forth in this section have been extracted from the IPSOS Report.

IPSOS is wholly-owned by IPSOS SA. Founded in Paris, France, in 1975 and publicly-listed on the NYSE Euronext Paris in 1999, IPSOS SA acquired Synovate Limited in October 2011 and then became the third largest research company in the world which employs approximately 16,000 personnel worldwide across 85 countries. IPSOS SA conducts research on market profiles, market size, share and segmentation analyses, distribution and value analyses, competitor tracking and corporate intelligence.

Analysis in the IPSOS Report are based on the following assumptions:

- The supply and demand of products and services provided by the construction engineering consulting and building services and building material distribution industry in the Hong Kong market are assumed to be stable and without shortage over the forecast period.
- It is assumed that there are no external shocks such as financial crises or natural disasters in the global market which could affect the demand and supply for/of the products and services of the construction engineering consulting and building services and building material distribution industry in Hong Kong over the forecast period.

### CONSTRUCTION INDUSTRY IN HONG KONG

The total gross output value of the construction industry accounted for about 3.3% of the total GDP in Hong Kong in 2010 and about 4.0% of the total GDP in Hong Kong in 2013. The total gross output value of the construction works performed by main contractors increased from approximately HK\$61.6 billion in 2010 to approximately HK\$121.5 billion in 2014, representing a CAGR of approximately 18.5%.

#### Historical price trend of construction worker wages



Sources: IPSOS research and analysis

The average wage of construction workers in Hong Kong increased from an estimated HK\$61.8 per hour in 2009 to an estimated HK\$86.9 per hour in 2014, representing a CAGR of approximately 7.1%. The considerable increase is attributable to a dearth of skilled and experienced workers, caused by a diminishing number of young people joining the industry.

#### FACADE AND ROOF CLADDING WORKS INDUSTRY

There has been a general trend for the separation of the building skin from the structure, which has led to facade consulting and contracting becoming a distinct sub-sector of the construction industry. Facade consulting is a relatively new industry which has developed in the last 20 years. Common types of facade system include stick systems, unit systems, unit and mullion systems and various glass wall systems.

#### Gross output value of the facade and roof cladding works industry in Hong Kong

The gross output value of facade and roof cladding works in Hong Kong increased from approximately HK\$330.5 million in 2010 to HK\$697.3 million in 2014, growing at a CAGR of approximately 20.5%.



Sources: IPSOS research and analysis

The considerable increase in facade and roof cladding works during 2010 and 2014 was primarily driven by new construction projects of leisure and cultural service centers as well as transport interchanges. It is expected that the gross output value of the facade and roof cladding works industry in Hong Kong will grow at a CAGR of approximately 5.8%, from about HK\$753.9 million in 2015 to about HK\$944.2 million in 2019. General urban development, especially in development areas such as Kai Tak, are deemed to provide more public utilities and recreation facilities, leading to more facade and roof cladding projects in the future.

#### Price trend of key materials in facade and roof cladding works industry



Sources: World Bank Global Economic Monitor - Commodities, IPSOS research and analysis

#### Notes: 2015 M2 refers to February of 2015.

Aluminum is a key raw material that is used in the fabrication of facade and roofing products. The price of aluminum has gradually fallen from HK17,365.3 per metric ton in 2010 to HK14,069.7 in 2015, although there was a slight increase between 2010 and 2011. This represents a CAGR of -4% between 2010 and 2015.

## Market drivers of the facade and roof cladding works industry in Hong Kong

It is anticipated that more residential buildings will be constructed in the near future and hence facade works will be in demand for the newly constructed buildings. In addition, facade works are likely to be driven by the urban development in the New Territories and Kowloon.

The government projects which require roof cladding works, will be another growth driver for the industry. With the urban development in areas closed to Guangdong Province and closer economic cooperation between Hong Kong and mainland China, it is anticipated that the roof works will likely be driven by future public projects in the developing areas.

## STRUCTURAL STEELWORKS INDUSTRY

In Hong Kong, the use of structural steel in construction has a history of approximately 70 years. In recent years, the structural steelworks industry grew considerably due to the Ten Major Infrastructure Projects and other public utilities projects. With the expected increase in public expenditure in the coming years, the industry is likely to continue growing.

The key customer segments in the structural steelworks industry can be categorised into two sectors — public sector and private sector.

- Public structural steelworks are mainly from government department, such as Architecture Service Department, Highway Department and Housing Authority, etc. As a crucial part of the construction projects, structural steelworks usually serve as the frame of the superstructure and are widely used in infrastructure projects. Therefore, the "Ten Major Infrastructure Projects" and other long-term infrastructure construction works have driven the structural steelworks industry to grow significantly.
- Private structural steelworks projects are mainly from private property owners or private corporations who construct commercial or high-rise buildings. As structural steel allows more aesthetic and flexibility in design, there is a trend that architects tend to build iconic commercial buildings with structural steel and hence this will fuel the growth of structural steelworks industry.

#### Gross output value of structural steel works in Hong Kong

The gross output value of structural steelworks in Hong Kong increased from approximately HK\$3,610.0 million in 2010 to HK\$6,587.0 million in 2014, growing at a CAGR of about 16.2%.



Sources: IPSOS research and analysis

The increase is mainly driven by the large investment in infrastructure over the past 5 years. It is expected that the gross output value of the structural steelworks industry in Hong Kong will grow at a CAGR of approximately 9.3%, from about HK\$7,292.0 million in 2015 to about HK\$10,412.0 million in 2019. It is anticipated that the public expenditure on infrastructure will increase from HK\$76.3 billion in 2015 to HK\$103.8 billion in 2019.

#### Price trend of key materials in structural steelworks industry



Sources: Ministry of Industry and Information Technology of the People's Republic of China; UN Comtrade; IPSOS research and analysis

Iron and non-alloy steel are considered as the key materials for structural steelworks industry. From 2010 to 2014, the average price of steel used for structural steelwork increased from an average of approximately HK\$5,073.9 per metric ton in 2010 to HK\$6,187.7 per metric ton in 2011, but decreased to HK\$5,304.4 per metric ton in 2014, representing a CAGR of about 1.1% from 2010 to 2014.

#### Market drivers of the structural steelworks industry in Hong Kong

Since the announcement of the "Ten Major Infrastructure Projects" in the 2007 Policy Address, the growth of the structural steelworks industry has been supported by commencing these large scale infrastructure projects. It is expected that more cross border infrastructure projects and public utility projects will be developed in the future, which will continue to drive the structural steelworks industry in Hong Kong.

The government has also planned to commence the construction of Hong Kong International Airport's third runway. Such construction projects are deemed to increase the demand for structural steelworks.

#### NOISE BARRIER INDUSTRY

The noise barrier industry in Hong Kong has a history of more than 30 years. In recent years, the noise barrier industry grew steadily because of the continuous expanding noise barrier coverage on the highway and private properties. According to the Environmental Protection Department of Hong Kong, the cumulative length of noise barrier structure increased from 84,000 meters in 2010 to 93,000 meters in 2013, representing a CAGR of about 2.6%. Such expansion have fueled the industry growth over the years and with the increasing public expenditure on infrastructure, the noise barrier industry will continue to grow steadily.

#### Gross output value of the noise barrier works industry in Hong Kong

The gross output value of noise barrier works in Hong Kong increased from approximately HK\$143.4 million in 2010 to HK\$219.8 million in 2014, growing at a CAGR of 11.4%.



Sources: IPSOS research and analysis

The considerable increase from 2010 to 2014 was mainly driven by government's efforts to mitigate noise pollution. It is expected that the gross output value of the noise barrier works industry in Hong Kong will grow at a CAGR of approximately 9.0%, from about HK\$232.1 million in 2015 to about HK\$327.8 million in 2019. Given the urban development in the New Territories and closer economic cooperation between Hong Kong and Guangdong province, it is likely that there will be more residential buildings and road and rail infrastructure constructed in the New Territories, which will increase the requirements for noise barrier projects.



#### Price trend of key materials in the noise barrier industry in Hong Kong

Sources: ICIS; UN Comtrade; IPSOS research and analysis

PMMA sheet is a key material for manufacturing noise barriers. It is a thermoplastic polymer of Methyl Methacrylate (MMA). From 2010 to 2014, the average price of PMMA sheet in Hong Kong decreased from approximately HK\$38.3/Kg in 2010 to approximately HK\$32.3/Kg in 2012. However, in 2014 the price began to increase, up to HK\$36.3/Kg. Overall, the CAGR was -1.3% from 2010 to 2014.

#### Market drivers of the noise barrier works industry in Hong Kong

The increasing awareness of controlling noise pollution and the related legislation for the management of noise has led to the construction of an increasing number of noise barriers. Some key legislations on noise control include Noise Control Ordinance (Cap. 400), Road Traffic Ordinance (Cap. 374) and the Noise Control (Motor Vehicles) (Amendment) Regulation. This legislation and the increasing awareness of noise pollution, have provided the growth momentum to the industry.

Increasing urban development in the New Territories in Hong Kong is a second growth driver to the noise barrier works industry. With the planning of new development areas in the New Territories, noise barrier works are required in order to reduce traffic noise for residents.

### FLAGPOLES AND RELATED WORKS INDUSTRY

The majority of the flagpoles and related works come from public works. The Hong Kong Government's endeavor to promote symbols of national and regional identity has driven the demand for flagpoles and related works. For instance, all governmental buildings including fire stations, hospitals and police stations are required to erect the national and regional flags every working day since August 2014, in order to underpin the one-country ideology. Moreover, according to School Miscellaneous Circular No. 2/98, it is optional for the non-governmental schools in Hong Kong to decide whether or not to erect national and regional flags.

#### Estimated retail value of aluminum flagpoles in Hong Kong

The estimated retail value of aluminum flagpoles sold in Hong Kong rose dramatically from approximately HK\$2.1 million in 2010 to approximately HK\$8.2 million in 2014, with a CAGR of approximately 40.2%.



Sources: IPSOS research and analysis

The retail value of aluminum flagpoles ranged from approximately HK\$2.1 million to approximately HK\$2.4 million from 2010 to 2013. The major demand came from secondary schools, swimming pools and other public buildings. The surge from 2013 to 2014 can be explained by the sudden increase in the demand from the Hong Kong Government. In 2014, aluminum flagpoles were established in at least 51 fire stations, 26 police stations and 8 ambulance depots.

#### Market drivers of the flagpoles and related works industry in Hong Kong

As the Hong Kong government requires the establishment of aluminium flagpoles outside all governmental buildings and public utilities, the construction of sports complexes, stadiums as well as government buildings are therefore expected to propel the flagpoles and related works industry in Hong Kong.

#### **RETAIL BUILDING MATERIAL INDUSTRY**

#### Aluminum and steel roof cladding materials

Aluminium is generally preferred because it can be formed into many shapes, roll formed on site, and treated give a wide variety of colours and textures. However, steel roof cladding is still a common choice for cost sensitive customers and in projects where aesthetic appeal is of less importance, such as for industrial buildings.

#### Noise barrier materials

With increasing urbanization and population density in Hong Kong, the demand for noise barriers has increased and has required the use of new materials and structural forms. PMMA is now the most commonly used material in noise barrier panels because of its cost effectiveness and transparency.

### Curtain wall accessories

Curtain wall accessories in Hong Kong are used in various places, such as office buildings, hotels, shopping centers, public buildings and residential buildings.

#### Safety system (fall arrest system)

As safety standards for working-at-height have become more stringent, the demand for safety systems has grown. The quality requirements for safety systems (fall arrest system) have also risen accordingly.

## Aluminum flagpole

In recent years, aluminum flagpoles have become the preferred choice due to their durability compared to timber, steel or fiber-glass equivalents.

## Market drivers of the building material supply industry in Hong Kong

The establishment of the Occupational Safety & Health Council (OSH) supports occupational safety in various industries (including construction industry). This leads to the increased usage and demand for safety systems (fall arrest system). To improve safety of working at heights, the OSH and the Labour Department launched a sponsorship scheme for renovation and maintenance and construction SMEs to purchase safety systems (fall arrest systems). Such scheme is favorable to the growth of the safety systems market.

The continual urban development in Hong Kong and construction industry growth through urban redevelopment and additions and alterations to existing buildings represent the major market driver for the building material supply industry.

## **ENTRY BARRIERS**

## Entry barriers of facade and roof cladding work industry in Hong Kong

#### Sufficient capital investment

The high start-up cost involved in entering the facade and roof cladding industry may pose difficulties for companies planning to enter the industry. Given that the facade and roof cladding works are run on a project-by-project basis, sufficient cash flow is required. Potential payment delays from main contractors therefore may lead to cash flow shortage to facade and roof cladding contractors, impacting their financial condition of the companies. As a result, the capital requirements and the ability to maintain sufficient levels of working capital may hinder potential players from entering the industry.

#### Technology-intensive nature and need to attract experienced professionals

The facade and roof cladding works industry is a technology-intensive industry. There is a rising trend for architects to design even more complicated facade and roof cladding systems to fulfill the aesthetic need. It is therefore important for contractors to possess the technological capabilities to perform high-end projects. Also, contractors need to have professionals experienced in choosing quality construction materials, monitoring fabrication, performing effective cost control as well as delivering

high standard facade and roof cladding design. Thus, it is often difficult for new entrants to enter the industry because they may not have enough experienced professionals to perform the facade and roof cladding works effectively.

#### Entry barriers of structural steelworks industry in Hong Kong

#### Huge capital investment

Structural steelworks contractors have to fulfill the minimum capital requirement for the official registration of the Approved Suppliers of Materials and Specialist Contractors for Public Works under the Development Bureau (structural steelworks category). This capital requirement may represent a barrier to some new entrants.

#### Lack of proven track record

Potential entrants find it difficult to capture market share. To be selected for public structural steelworks contracts, the contractor has to be an approved contractor which requires fulfilling the following criteria: completion of at least 3 projects in the fabrication and erection of structural steelworks for permanent civil engineering or building structures in the past 3 years, each with a value of HK\$500,000 or more. The new entrants lacking successful project records may find it hard to obtain sizable structural steelworks projects, compared to existing market players.

#### Entry barriers in the noise barrier works industry in Hong Kong

#### Lack of proven track record

Potential entrants find it difficult to capture market share and to obtain public projects. To be selected for public noise barrier works, contractors have to be approved contractors for noise barrier works under the Development Bureau in Hong Kong. To be eligible for tendering public noise barrier works contracts, companies are required to have a proven track record of successful noise barrier works. In this case, the new entrants may find it impossible to obtain high value projects compared to existing market players.

#### Entry barriers flagpoles and related works industry in Hong Kong

#### Credibility and track record

As the major end-user of flagpoles and related works is the Hong Kong Government, who value the credibility and track record of the suppliers, new entrants often find it difficult to be awarded tenders without a proven track record. The importance of possessing decent credibility and a strong track record may reduce the business opportunities available to new entrants.

#### Customer relationships

Customer relationships are crucial in the flagpoles and related work industry because the end-users have a tendency of choosing a stable subcontractor. New entrants, therefore, may find it difficult to sustain their business due to their lack of strong customer relationships.

## Entry barriers in the building material supply industry in Hong Kong

## Credibility

It is vitally important for the building material suppliers to build solid credibility. New entrants often find it difficult to enter the industry without a proven track record. Therefore, future business opportunities of new entrants would be fewer due to their lack of track record and credibility.

## Customer relationships

Customer relationships are a key success factor in the building material supply industry. Two major criteria of selecting building material suppliers are (i) credibility, and (ii) established connections. As the end-users tend to have stable building material suppliers, new entrants may therefore struggle with sustaining their business without sufficient demand.

## FUTURE TRENDS AND DEVELOPMENTS

## Future trends and development of facade and roof cladding works industry

The facade market is driven by architects who produce designs which demand new production and material technologies. Increasing energy efficiency is also likely to be a key future trend, and it is expected that there will be an increasing demand for high performance energy efficient facade systems that use solar protection glass and double-skin facades in order to minimise solar energy gain while allowing maximum visible light transmission.

## Future trends and developments of the structural steelworks industry

The structural steelworks industry is not considered a labour intensive industry. A typical construction team including the supervision staff as well as the construction workers, usually has about 20 people. Nevertheless it suffers from the increasing labour cost driven by the labour shortage in recent years. The rising labour cost over the years has become the major driver to the upward trend of subcontracting fees for the erection of structural steelworks.

It is notable that the Hong Kong Government has greatly invested in infrastructure projects to extend the transport linkage between China and Hong Kong. These mega infrastructure projects have supported the growth of the Hong Kong construction industry since their commencement. Since the structural steelworks industry is mainly driven by infrastructure projects, the thriving infrastructure activities in recent years are deemed to give rise to a strong demand for the structural steelworks industry.

## Future trends and development of noise barrier work industry

As the population density increases, more people are likely to live near to main roads and be victim to high levels of traffic noise pollution. There is likely to be increasing regulation to control noise pollution through the implementation of Environmental Impact Assessments and other laws. This is likely to drive the market for noise barriers. New road infrastructure, new railway and MTR infrastructure projects will increase the demand for noise barriers. There is a push for innovative and modern designs in the noise barrier sector, in order to increase the aesthetic appeal of noise barriers.

#### Future trends and development of flagpoles and related works industry

The flagpole and related works industry are considered to be relatively constant and there are not likely to be any major changes within the industry. Aluminum is likely to continue to be used as the key material.

#### **OPPORTUNITIES AND THREATS**

#### Opportunities and threats of facade and roof cladding industry

The growing trend for green building materials is likely to be the growth driver for the facade and roof cladding works industry in Hong Kong. It is expected that the demand for environmental-friendly facade and roof cladding materials will increase. In addition, such demand for facade and roof cladding will be further increased if environmental building legislation is passed by the government.

The Kai Tak area development is a complex project and the facilities often require substantial facade and roof cladding works, and hence they are deemed to increase the demand for the facade and roof cladding works considerably during the re-development. As the Kai Tak area will be developed up until around 2021, this development project will contribute to the growth of the facade and roof cladding industry in Hong Kong.

The facade and roof cladding industry faces the problem of labour shortage. Insufficient experienced and skilled workers and an aging workforce may lead to difficulties hiring enough labour and potential project delays, hindering the development of the industry in Hong Kong.

The labour shortage has driven up the cost of labour, which has increased construction costs. The average wage of construction worker in Hong Kong increased by approximately 40.6% from 2009 to 2014. It is anticipated that the increasing labour cost may continue because of the worsening aging workforce. To attract people working in the facade and roof cladding industry, companies need to raise salaries and therefore labour cost increases. Facade and roof cladding system costs are also increasing because of the higher fabrication costs in China.

Inaccurate cost estimation and unreasonable tendering price may also pose a threat to facade and roof cladding contractors. If the contractor fails to accurately to estimate the complexity of a project and proposes an unreasonable low price, the contractor may have difficulties finishing the project on budget. This can even cause a company to go bankrupt.

#### Opportunities and threats of structural steelworks industry

Structural steel is able to withstand high yield stress in both compression and tension. As a result, the seismic-resistant nature of structural steel will become more favorable and appealing after the introduction of seismic-resistant building design standards for new buildings. Therefore, using structural steel in buildings is likely to become a more common construction technique in Hong Kong in the future.

Hong Kong has been a successful global business hub, attracting a number of leading financial institutions and corporations. It is expected that the increasing number of newly registered companies in Hong Kong will lead to an increasing demand for office space in Hong Kong companies, there will be

more commercial buildings constructed in the future. At the same time, the design of modern commercial buildings favors slimness and transparency, which is most cost effectively and practically constructed using structural steel.

Structural steel welders are in great demand because the number of welders has not grown with the number of construction projects. Moreover, the decline in the number of young people entering into the construction industry, coupled with retirement for older workers, has worsened the labour shortage issue in the structural steelworks industry in Hong Kong. Lacking experienced and skilled labour may result in a further increase in the labour cost.

Structural steelworks contractors have been facing increasing construction costs. The average daily wage of structural steel erectors and welders has been increasing. In addition, steel is imported to Hong Kong from around the world. The price of structural steel may vary depending on the currency exchange rate as well as the global demand and supply. As a result, the uncertainty of raw material costs for structural steelworks and the rising wages of structural steel workers has raised the total construction costs for the contractors.

#### Opportunities and threats of noise barrier works industry

The Ten Major Infrastructure Projects include a significant number of transport projects that are likely to require noise barrier works. Since these transportation development projects will be built in close proximity to residential areas, noise barrier works are necessary to reduce traffic noise. In addition, the newly developed residential areas connected by these transportation projects will become more accessible and therefore further noise barriers may also be required to control noise pollution.

Noise barrier works contractors have been facing increasing construction costs mainly caused by the rising labour cost. This is a threat to the construction industry, primarily because a significant number of experienced and skilled workers are lured to mainland China and Macau. The decline in the number of young people entering into the construction industry is another factor that has driven up the labour cost.

The price of the major raw material of noise barriers — PMMA — is expected to increase due to the increasing manufacturing cost. The upward trend of raw material costs for noise barrier works and the rising wages of noise barrier workers have raised the total construction costs for the contractors. These factors may contribute to the lowering of profit margins for noise barrier works contractors.

#### Opportunities and threats of building material supply Industry

As the performance of the building material supply industry is highly linked with the construction industry, the positive construction outlook in Hong Kong from 2010 to 2014 has considerably bolstered the demand for building materials.

As the building materials in Hong Kong are imported from foreign countries, fluctuation of the exchange rates would adversely impact the import price of the building materials, which may in turn hamper the building material supply industry in Hong Kong.

#### COMPETITIVE LANDSCAPE AND ADVANTAGES

#### Competitive landscape of the facade and roof cladding works industry in Hong Kong

The facade works industry in Hong Kong is a relatively consolidated market with major players dominating the industry. As of May 2015, there are about 13 leading players in the facade works industry. The industry can be further categorised into two segments — high end facade market and middle end facade market. In the high end facade works market, companies intentionally operate on high project values, high quality facade works and aesthetic design. There are three major players in Hong Kong. In the middle end facade market, which features with smaller scale projects, there are approximately 10 leading players, including KPa Engineering, whose business is generally domestic based.

The roof cladding works industry in Hong Kong is dominated by 4 major players, including KPa Engineering. The rest of the players mainly perform smaller scale projects, with each individual company accounting for very small market share.

The top five companies in the facade and roof works sector account for a total market share of 68.3%, while KPa Engineering has a market share of approximately 20.8%.

Rank	Company Name	Headquarters location	Revenue in 2014 in Hong Kong HK\$ million	Share to total industry revenue in Hong Kong %	Key product and service coverage
1	KPa Engineering	Hong Kong	144.7	20.8%	Design, supply and installation of curtain wall, glass wall, roof cladding, wall cladding, skylight, covered walkway and noise barrier.
2	Craft Projects International Co. Limited	Hong Kong	122.5	17.6%	Design, supply and installation of structural steel, curtain wall, roof & wall cladding.
3	Midi Aluminum Fabricator Limited	Hong Kong	75.9	10.9%	Design, supply and installation of curtain wall, glass wall, aluminum louvre.
4	Permasteelisa Group	Germany	72.2	10.4%	Manufacturing and installation of architectural envelopes and interior systems.
5	Empire (Asia) Engineering Co. Limited	Hong Kong	60.2	8.6%	Design, supply and installation of roofing system, wall cladding system and aluminum louvre.
Others		221.8	31.7%		
Total		697.3	100%		

Sources: IPSOS research and analysis

## Competitive landscape of the structural steelworks industry in Hong Kong

The structural steelworks industry in Hong Kong is relatively consolidated. As of May 2015, there are 44 registered specialist contractors for public works in the structural steelworks category under the Development Bureau. The top seven players of the structural steelworks industry accounted for more than 50% of market share of the industry.

#### Competitive landscape of the noise barrier works industry in Hong Kong

The noise barrier works industry in Hong Kong is relatively concentrated with a small number of major players dominating the industry. As of May 2015, there were six key players in the noise barrier works industry in Hong Kong. These players act as subcontractors to main contractors and noise barrier contractors. The companies and their key products are detailed in the table below. The top five players were estimated to account for 98.1% of the noise barrier works market in 2014, while KPa Engineering has an estimated market share of 2.2%.

Rank	Company Name	Headquarters location	Revenue in 2014 in Hong Kong	in Hong Kong	Key product and service coverage
			HK\$ million	%	
1	Active Way Limited	Hong Kong	130.0	59.1%	Design, supply and installation of architectural plastics, glass and structural steel works.
2	Gammon Construction Limited	Hong Kong	42.7	19.4%	Design, management and construction services in building, civil engineering, foundations, electrical and mechanical, infrastructure maintenance and operation.
3	Classic Engineering Company Limited	Hong Kong	30.7	14.0%	Design, supply and installation of architectural plastics, glass and structural steel works.
4	Sonotec Far East Limited	Hong Kong	7.5	3.4%	Supply and installation of noise barriers and noise enclosures, acoustic panels, ceilings and cladding.
5	KPa Engineering	Hong Kong	4.8	2.2%	Design, supply and installation of curtain wall, glass wall, roof cladding, wall cladding, skylight, covered walkway and noise barrier.
Others			4.1	1.9%	
Total		219.8	100%		

Sources: IPSOS research and analysis

## Competitive landscape of flagpoles and related works industry

The competitive landscape of the flagpole and related works industry is relatively concentrated, with a small number of players. It is estimated that the Group's market share in 2014 was approximately 72.0%.

### Competitive advantages of the Group

For the Group's competitive advantages, please refer to the section headed "Business — Competitive strengths" to this prospectus.