

In the saddle for an **INTERNATIONAL** challenge

Sponsorship of the 2013 Superbike World Championship underlines FASSI's position as a global company

From conception to crane

The R&D Director, Rossano Ceresoli, gives us an insight into the entire design and construction process of Fassi machines

The new F120B and F125A OO Time stands still

F120B and F125A, the light-duty range grows. The cranes are 20 percent lighter and have a 15 percent increase in hydraulic outreach

With Fassi: 70% of the cranes produced by the company over the last 50 years are still in operation

SUMMARY From conception to crone WITHOUT No.14 - year 2013 COMPROMISE Fassi, a long term investment International information magazine of the Group Over the last 50 years, the Fassi Group has built more than 120 cranes, each with its own special features. D_{eq/er} Interview with the R&D Director, Rossano Ceresoli 70% of the cranes produced by the company from Albino over the last 50 years are still in operation. These numbers are the guarantee of long term quality and durability Events& Fairs F120B and F125A, the light-duty range grows 20% lighter and a 15% increase in hydraulic outreach. Sponsorship Special Fassi's new products Fassi Ladekrane, 18 years of success. Interview with Wolfgang Feldmann, Chief Executive of Fassi's Cranes at work German branch Fassi will be one of the protagonists at the 30th Edition of Bauma, the most important international trade fair in the construction industry From revving engines to football. Behind the scenes



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via Roma, 110 24021 Albino (BG) Italy tel +39.035.776400 fax +39.035.755020

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of Fassi's sponsorships. Interview with Giovanni Fassi,

The Fassi F385A on the ice sheets of the South Pole of Wissard research, an American project, which is also

Chief Executive of the company from Albino

Modulimpianti Snc via G. Leopardi 1/3 24042 Capriate S. Gervasio (BG)

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INTERNATIONAL

vocation

The years of economic crisis have more markedly underlined one of the fundamental characteristics of our DNA: our international vocation. Let's try to understand why. Right from the start, this company has focused on product and service innovation to offer solutions that often pre-empt market needs and demands. Always being one step ahead and never being satisfied are the cornerstones of our being. However, having excellent products supplemented by a reliable and efficient customer care system have no longer been enough over the last few years. We risk finding ourselves with marvellous flowers in the middle of the desert, as if we didn't have a precise position and distribution strategy that could open our horizons.

For many companies, the step towards internationalisation has been a necessary and laborious step. For us at Fassi, it has been part of the normal evolution of a process that has been in place for years.

The proof is in the 2012 data analysis where we can clearly see the importance of the export factor that represents around 93% of turnover for our Group. In a period of overall contraction, this turnover has been able to consolidate along the same lines as the year before: 120 million euro.

Fassi has been able to grasp opportunities in international markets, building on its position in areas where it was already very strong, but working hard to win over new segments in emerging countries. We now speak nearly all worldwide languages and our cranes operate far and wide across the world, from Antarctica to the Freedom Tower construction sites in New York, and from Australia to Argentina. We are present in 60 international markets and Fassi is a synonym worldwide of guarantees, performance, efficiency and investment. All this obviously without forgetting our Italian soul.

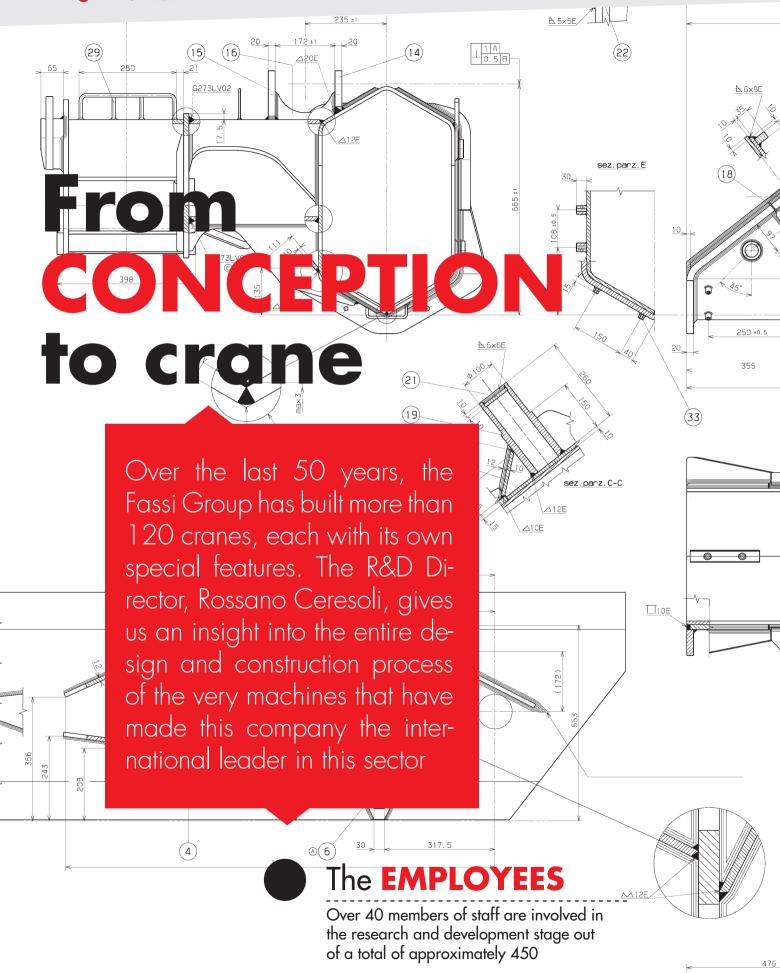
We are also assisted in our feat by a widespread and extraordinary distribution network by which we have been able to export not only our products, but also a business model, a style, a brand name and everything that comes with it.

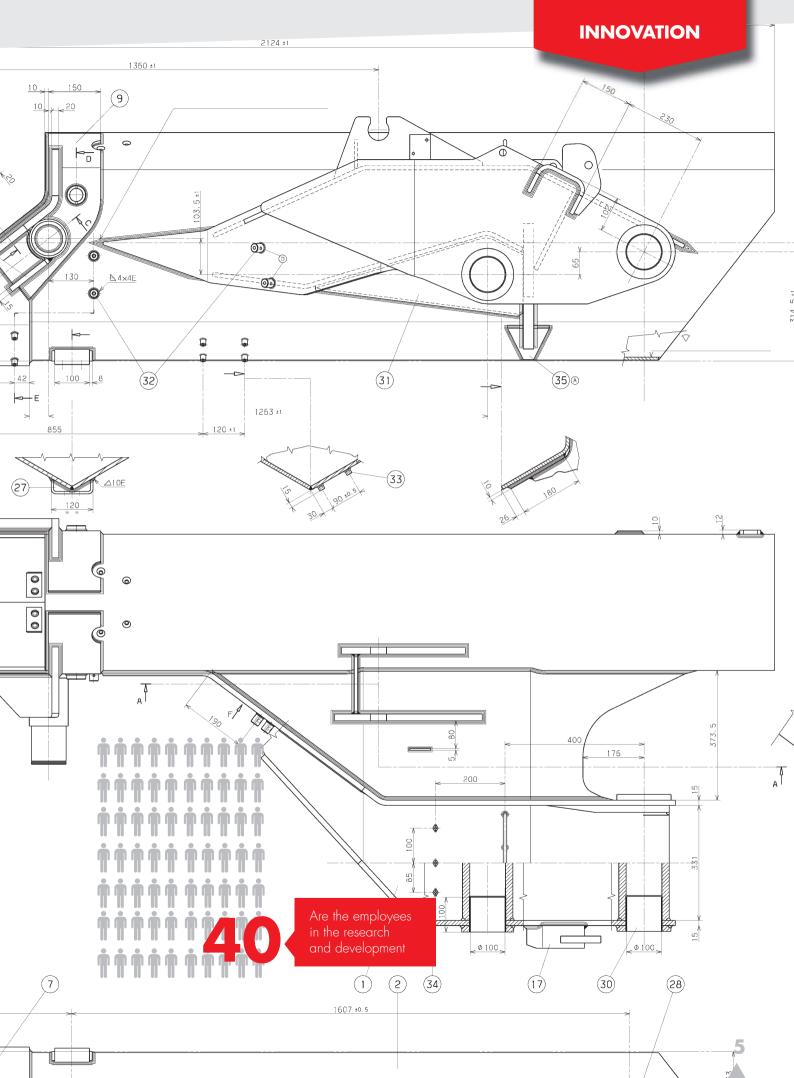
Our international spirit will also soon see us under the spotlight in Bauma. The Munich construction trade fair is the most important in Europe and among the most important in the world. We will be present at this strategic appointment to confirm once again our leadership and our international vocation.

We are protagonists on a world stage with only one line to pronounce: excellence, without compromise.

As you will have noticed, this number of "Without compromise" has a new look and style. This is just another sign of a company that is continually evolving, also in terms of its communication with speakers. Happy reading.









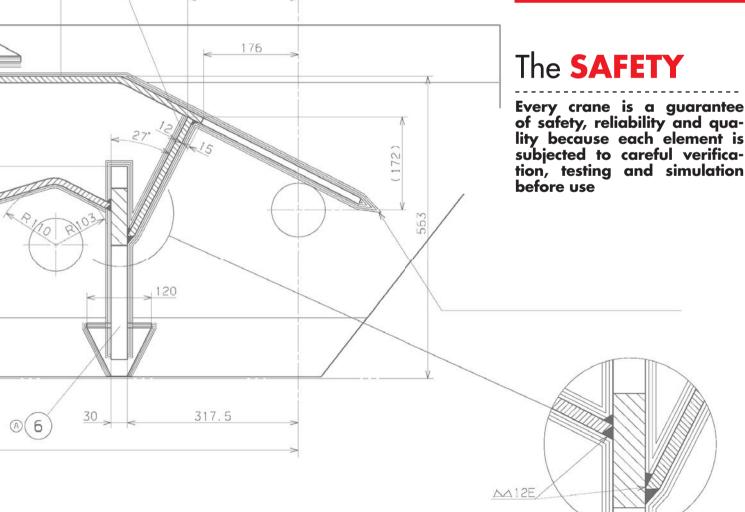
Every crane has its own design story, features and uniqueness. Every crane is the result of many ideas that have taken shape thanks to the experience and professionalism of various work teams and ad hoc-devised innovative technologies. Over the past 50 years, the Fassi Group has created more than 120 models of quality, long-lasting cranes and 90% of these were built at the company's production sites, often inventing new technologies and innovations. Every crane is a guarantee of safety, reliability and quality because each element is subjected to careful verification, testing and simulation before use. The end product, whether it be a light-duty, medium-duty, heavy-duty crane, or hydraulic jib extension, is the result of a plethora of studies, research, conception, design, tests and analysis; an iceberg of processes that have enabled us to deliver a quality, safe and high performance product to the market. With Rossano Ceresoli, Technical Director and Product Research and Development Manager of the Fassi Group, we have explored the entire process behind the birth of a Fassi crane, starting from the motivations behind its creation. Ceresoli explains that "A crane can be created as a result of market input due to new needs (performance or certain types of work) or as a result of the company's desire to develop a specific model that is innovative for the market"; an "entrepreneurial spirit" ahead of its time that has led to the creation of true products of reference, even for the competition. In fact, each crane conceals within a world of technology, ranging from electronic systems to hydraulic

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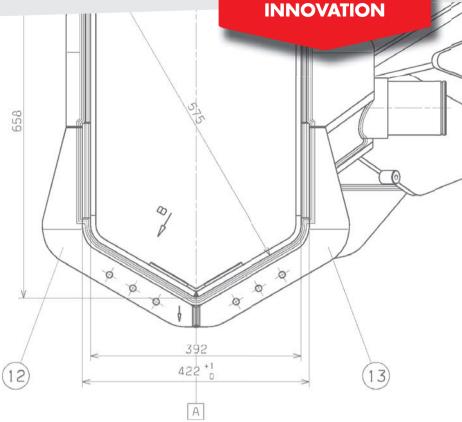


A moment of prototyping of a Fassi crane

of safety, reliability and quality because each element is subjected to careful verification, testing and simulation







functions to mechanical solutions, which become an added value on the innovation front because they have been studied and designed directly by Fassi.

Market needs are met by Fassi's broad and widespread sales network. Meetings are also regularly organised across Italy and internationally, which become occasions for exchanges and debates in the search for new solutions.

Over 40 members of staff are involved in the research and development stage out of a total of approximately 450. Once the elements and ideas have been collected, the Fassi procedure is industrialised in compliance with the ISO 9001:2000 standard. "As a company, we are very careful to ensure that the result is verified and measured", states Ceresoli. "The proposal must be a winner from the start; one that has a future impact on the market". After the sales department has developed the "product specifications", the command goes to the technical directorate, which translates it into "technical specifications"; i.e. all the reflections and feelings of the market are translated into numbers. With the specifications

in hand, the technical directorate continues to work on the strategic designs. "I, together with the designers from the technical department, work on what are considered to be the precursor cranes of a new range", says Ceresoli. "The other roles in this department work on other complementary projects and on the new versions of cranes that are created from them".

Simulation and prototyping

The numbers are then turned into a virtual reality simulation with regard to both performance and design. In the case of performance, a software calculator is used (for the dimensions of the machine) that enables us to evaluate the machine's performance, and all results are checked against the requests from the sales department. "The software calculator was developed together with an important Italian university and it is owned by the company", states Ceresoli. "With this tool, we can simulate and measure the machine's performance, even though we still haven't produced any designs." For design, Catia V5 is used, one of the leading prototyping softwares used since 1979. Ceresoli explains that "this is a tool that enables the so-called verticalisation of the process, i.e.



90% of the cranes are built at the company's production sites

10%

10% of the components come from other companies





within a single tool, I can apply a series of typical simulation functions to understand what my design will be like". From theory and the "virtual" phase, we then move on to creating drawings and three prototypes: one which will be used for fatigue testing, a second for process and production equipment checks and the last for machine set-up and functional testing. This is a phase that requires significant economic investment by the company. "For example, each of the three physical prototypes of the F1950RA crane had a cost that was three times higher than the marketed product", Ceresoli points out, "because everything is constructed as an individual piece and not as the results of an industrial process". One of the prototypes is subjected to fatigue testing, so checks are made to ensure that all the prerequisites of the design have been met and implemented. In this phase, all steps of the production process are verified. This is a process in which Fassi can claim a signifi-

cant level of expertise and thirty years' experience. "This step allows us to move on to the production phase with a machine that has been 100% tested, which means that we are not putting a product with anomalies on the market. In fact, all our cranes are built with production parameters that have been identified and developed during the prototyping phase".

A minimum of 200,000 to a maximum of 300,000 fatigue cycles are carried out, based on the sector type. Once the go-ahead has been given following the tests on the first prototype, testing starts on the second, which is transported onto external benches to test all loading conditions: maximum vertical loads and elastic deformation.

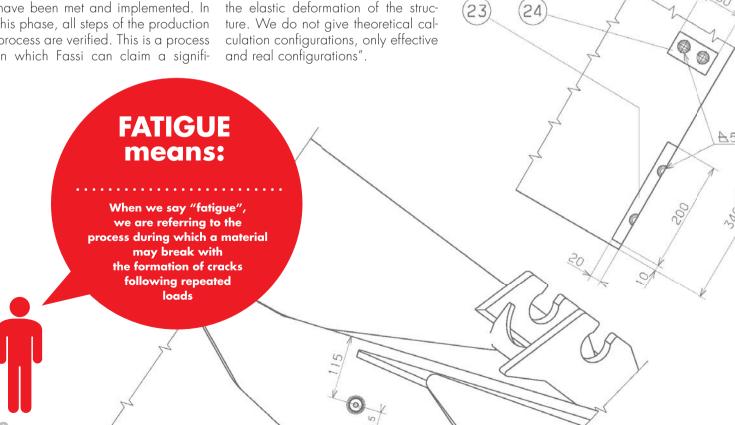
Ceresoli explains that "compared to our competitors, Fassi guarantees performance that takes into account culation configurations, only effective and real configurations".

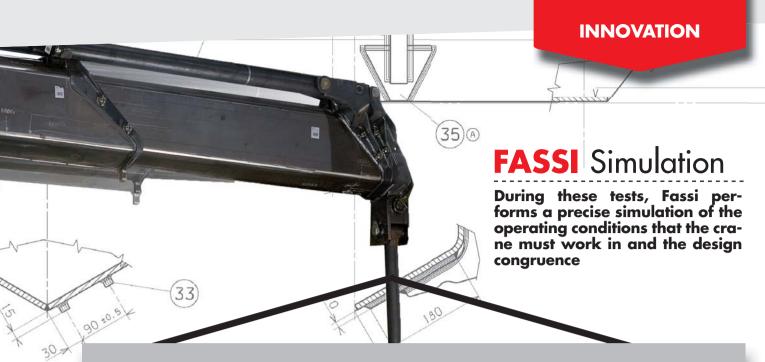
FATIGUE 000 cycles

The phenomenon of fatigue can be triggered after 1000 lifting cycles

CONGRUENCE 200.000 cycles

Design congruence is verified by continuous cycles with a minimum of 200,000 work





FATIGUE testing







The first of the prototypes created by Fassi is used for the hard job of fatigue testing. Fassi has been performing these types of tests on its products since 1980.

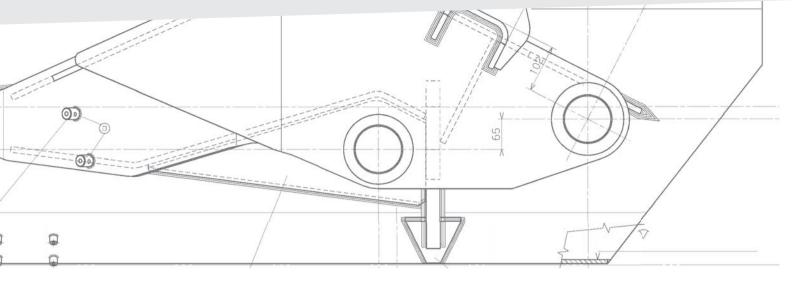
When we say "fatigue", we are referring to the process during which a material may break with the formation of cracks following repeated loads. The stresses that cause this phenomenon can be lower than the yield limit of the material and, in practice, we have fatigue when we exceed 1000 load cycles. During these tests, Fassi performs a precise simulation of the operating conditions that the crane must work in and the design congruence is checked at a minimum of 200,000 load cycles.

This enables designers to effectively evaluate how consistent the crane is with the design data. In a first instance, this is evaluated based on the effects of the concentration, stress, forms, number of cycles and the statistical load curve and in a second instance, based on factors such as static resistance, mean stress, residual welding stress, sheet thickness, operating temperature and load frequency. From a practical point of view, the prototype undergoing testing is mounted on a special instrumented bench. After having determined the dynamic effects due to load movement using a special calculation program, the structure is "fatigued" by directly using the lifting outriggers. This enables us to act by applying isobars, or constant pressure, even by combining various position and outreach configurations. This condition keeps the crane's lifting power at a near constant level because, in Fassi, we do not use a load average, but rather "the moment" of the crane is kept at the set values during all tests. During the testing pe-

riod, an expert tester will monitor the integrity of the structure at strictly scheduled periods by means of visual, non-destructive controls. With the help of technologies such as penetrating oils, magnaflux, ultrasounds and extensometers, we can identify positive results and any appearance of fatigue cracks, thus providing us with a progress analysis and correct solutions.

At the end of the test, the crane is fully disassembled and individual parts are evaluated whole by involving other company departments in addition to the research and development team, such as the industrialisation department, the technology laboratory and quality control.





Choice of raw materials

Quality has always been the common theme by which Fassi designs and builds its products. Quality is at the basis of all the materials used in constructing our cranes, which are selected and tested by our own internal quality laboratory, where a series of tests are performed on the individual parts used to build the cranes. The main material remains steel, which comes from the best steelworks located predominantly in Northern Europe. The Technical Director, Head of Product Research and Development of the Fassi Group explains that "thanks to our fatigue tests and the results we achieve, we are able to provide a series of details to the steelworks so that they can develop steels that meet our design needs". But the company does not stop at the certification provided by the steelworks; it goes beyond, because every piece that arrives at Fassi production sites is verified, tested and homologated in our quality laboratory.

This is evidence of the scrupulous attention that is not only given to the steel we use, but also to the other materials used to build cranes. Using a special room for salt spray testing, the quality laboratory issues its surface protection certifications, from galvanisation to glazing, in accordance with the relevant standards. "This is how we can guarantee that our glazing or surface treatment process is really able to resist for a really high number of hours before it shows signs of corrosion (or not as the case may be)".

Another essential element is the electronics; the parts of which come from external partners following studies undertaken within Fassi's technical department. In this case again, each piece is tested by the quality laboratory using a climate controlled room, which can perform stability tests using temperature cycles with both high and low temperatures. With regard to electronics and single materials, Fassi does not use PLC devices or counter-purchase electronic products. Ceresoli clarifies that "all testing systems are developed following our specifications and are dedicated to us. The choice of components such as microprocessors are chosen by us or with us, as is the safety architecture".

INTELLIMECH Consortium

Fassi Gru is part of Intellimech, a consortium of companies dedicated to mechatronics. promoted by Kilometro Confindustria Rosso, Bergamo and Servitec. The Consortium is involved in interdisciplinary research in the field of mechatronics, including advanced electronic design, IT design and ICT system design as well as general mechanical design for application in a diverse range of industries. The Consortium also manages R&D and interdisciplinary experimental programmes on precompetitive technolo-

gy platforms and produces prototypes and models for innovative, multi-industry applications that are relevant to the sectors in which the members operate. The methodologies deployed focus on the integration of the technologies and expertise required to reach new frontiers of research and to kick-start innovative processes (radical, incremental, relating to product and process...) and technological discontinuity that will subsequently give rise to the development of a range of proprietary applications.



Intellimech is a consortium of companies dedicated to mechatronics, promoted by Kilometro Rosso, Confindustria Bergamo and Servitec



construction of our cranes, the Quality Laboratory of the Fassi Group is involved in all phases by performing ad hoc tests, controls, verifications and issuing certifications.

We are committed to a search for quality that goes beyond the standards imposed on a national and international scale in order to meet the specific needs required by Fassi itself to guarantee high level, reliable and durable products. The Fassi Quality Management System complies with the ISO 9001:2000 standard.

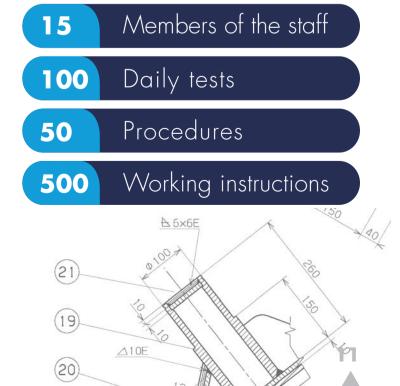
More specifically, the quality control staff are required to perform a series of checks and controls, including:

- product homologation; i.e. verification of all raw materials and all parts required to construct the machines;
- prototype testing;
- preparing spot welding and normal welding cycles for structural parts;
- welding procedure qualification record (WPQR) and drafting welding procedure specifications (WPS) for new welding procedures and all critical welding joints;
- qualification of welders, from both associated companies and suppliers;
- validating the "first supply" of a structurework part and hydraulic outriggers;
- homologating new suppliers;
- non-destructive checks on welding operations (ultrasounds, penetrating oils and magnetoscope);
- tests in the climate-controlled room on electronic parts (from -40°C to +120°C) and with damp heat cycles;
- sizing tests;
- mechanical tests on different materials;
- checks on oil contamination on incoming cranes and during testing;
- checks on incoming parts obtained from external providers;
- salt spray corrosion tests on surface treatments (glazing,

galvanisation, plating);

- inspections of primary suppliers;
- analysis of returned faulty parts;
- crane testing, guaranteed by phase-by-phase procedures prepared by the Quality Control department.

There are more than 50 procedures used for testing parts that are in transit from intake and more than 500 working instructions required to guarantee that the production process is adequately monitored and controlled.





TIME STANDS STILL with Fassi Cranes

70% of the cranes produced by the company from Albino over the last 50 years are still in operation. These numbers are the guarantee of long term quality and durability

Fassi cranes show no signs of ageing. They do not need an elixir of life; rather they guarantee a quality and average lifespan of well over 10 years, the period identified by competitors as the "expiry date" of the working life of their products. When a Fassi crane starts work, it is destined to last much longer. This is not a statement of intent, but a promise.

And we have the numbers to prove it: a good 70% of Fassi cranes manufactured in the 1970s are still in operation today and quality remains unchanged.

The merit is of the high level of attention, given in the design and prototyping phase, to the tests conducted on prototypes and the entire quality control process. These are procedures and tests that enable us to produce reliable, high performance cranes and parts that can resist wear and tear over time.

Fassi cranes follow the new standards (former H1B3). which means that their quality remains unchanged for much longer than the competition.

This is proof of quality that is further consolidated by the fact that on the market, a used Fassi crane continues to maintain a high standard and does not lose value. Therefore, choosing Fassi is a real economic and business investment that translates to profitability in daily use. Thanks to technological developments that establish innovation as a characterising and competitive value, Fassi cranes guarantee superior capacity and performance. Working better and faster, in complete safety in all lifting conditions, even in those most complex and onerous, leads to concrete bene-



Fassi COMPETITIN

Every Fassi crane is a real economic and business investment that translates to profitability in daily use

TANGIBLE BENEFITS



technological developments



innovation



resistance



superior capacity



speed



guaranteed return



safety



dependability





Choosing FASSI

A crane must always be in full working order. This is why choosing a Fassi crane means making a quality investment with high added value, which will create short and long term returns that are also easier to amortise with a guaranteed return



fits in terms of return. Fassi is among the few constructors in the world that is renowned for fatigue testing every one of the models it develops. When we say "fatigue", we are referring to the process during which a material may break with the formation of cracks following repeated

loads. In practice, it has been observed that, in particular conditions, this phenomenon can be triggered by just 1000 lifting cycles. is why design congruence is verified by continuous cycles with a minimum of 200,000 work cycles using an

instrumented prototype

crane assembled on a spe-

Test on a steel bar

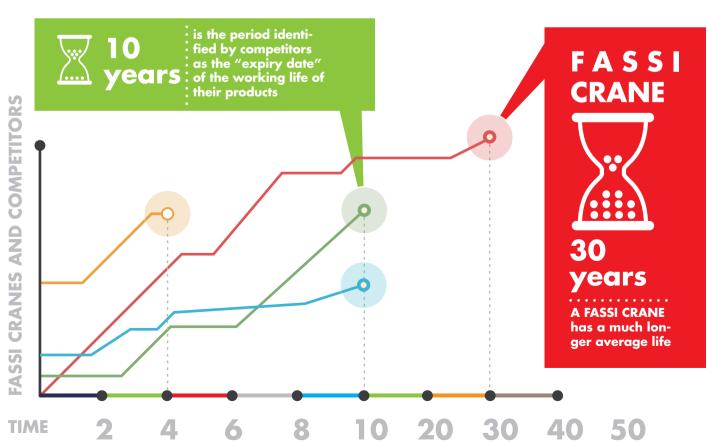
A REAL investment

Thanks to technological developments that establish innovation as a competitive value, Fassi cranes guarantee superior performance. Working better and faster, in complete safety in all lifting conditions, leads to benefits in terms of return

cial bench. A crane must always be in full working order. This is why choosing a Fassi crane means making a quality investment with high added value, which will create short and long term returns that are also easier to amortise with a guaranteed return.





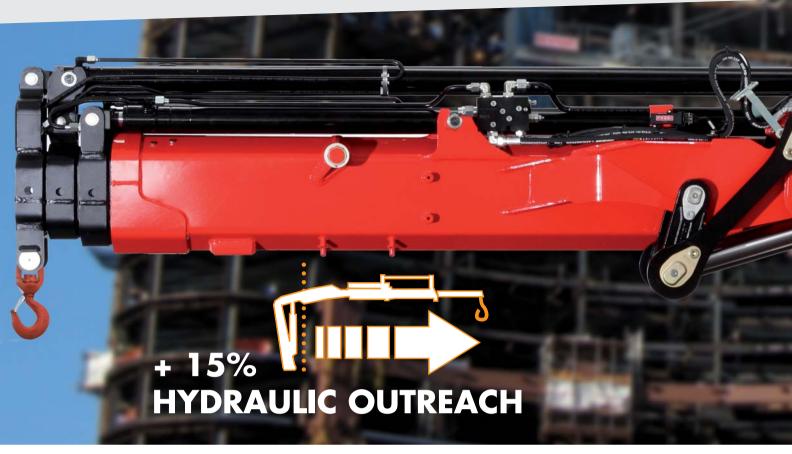












Fassi's 10 tm segment range has grown with the addition of two new models equipped with the most advanced technology applications. In fact, the F120B.1 and the F120B.2 benefit from the most sophisticated and innovative principles developed for the larger cranes. The new features consist of the inclusion of a linkage at the joint between the column and the main boom (F120B.1) and a possible second linkage (F120B.2) between the main boom and the secondary boom. The offer will also be completed by a model without linkages, called the F120B.0.

The F125A model is one of the first Fassi cranes in the light-duty range that is offered with the option of the exclusive ADC device for the automatic dynamic control of all crane functions, thus maximising speed of movement based on the manoeuvred load, always producing well-controlled movements and minimising structural strains on the

crane and frame/counter-frame of the vehicle. Weight, obstacles and performance are the same as the F120B model and the version without linkages is not available. Thanks to the type of technological solutions adopted, the F120B and the F125A can meet all utilisation needs. More specifically, the .25 version is 20% lighter and has a 15% increase in hydraulic outreach; and the .24 version has a 65% increase in the mobile grab maximum load (in the dual linkage version) and an optional hydraulic jib extension. The new cranes F120B.1/F120B.2 and F125A.1/F125A.2 are available in five different versions for both segments, identified with the .21 and .25 codes, which correspond to the number of hydraulic extensions (from one to five); the outreach ranges from 5.7 metres in the .21 to 14.1 metres in the .25.

SPECIFICATIONS

- Weight reduced by 20 percent
- A 15% increased of the hydraulic outreach (version .25)
- A 65% increased in the mobile grab maximum load (in the dual linkage version)
- An optional hydraulic jib extension on the version .24

The ADC device:

Fassi Automatic Dynamic Control

L'ADC (Automatic Dynamic Control) è il dispositivo di controllo automatico della dinamica sviluppato da Fassi. Effettua il controllo della dinamica su tutte le funzioni della gru massimizzando la velocità di movimento in funzione del carico manovrato, realizzando movimentazioni sempre ben controllate e riducendo al minimo le sollecitazioni strutturali sulla gru e sul telaio/controtelaio del veicolo.





NEWS FROM HEAVY-DUTY CRANES Fifty metres high in the sky

With the new F1950RAL-L816L combination, Fassi is looking up.The F1950RAL-L816L model has the largest outreach ever created by Fassi. In fact, it is the first crane to reach 50 metres of height and departs from the concept of being foldable behind the cab when not in use because the crane remains extended on the loading area. The crane is offered in a "full optional" electronic configuration; the base version has eight hydraulic extensions with a lifting capacity of 127 tm and a maximum hydraulic outreach of nearly 25 m, which can also be combined with the L816L hydraulic extension with the same lifting capacity, but with a hydraulic outreach of 41.30 m which, with the hydraulic extensions, can reach over 50 m.



The F1950RAL-L816L model



The new **F120B.1**

Versions

For the basic versions:

- 1. Version .21 with 1 hydraulic extension (5.65 m outreach) Lifting capacity: 11.00 tm Weight: 1130 kg;
- 2. Version .22 with 2 hydraulic extensions (7.70 m outreach) Lifting capacity: 10.70 tm Weight: 1240 kg;
- 3. Version .23 with 3 hydraulic extensions (9.80 m outreach) Lifting capacity: 10.30 tm Weight: 1345 kg;
- 4. Version .24 with 4 hydraulic extensions (11.95 m outreach) Lifting capacity: 10.10 tm Weight: 1440 kg;
- 5. Version .25 with 5 hydraulic extensions (14.05 m outreach) Lifting capacity: 9.80 tm Weight: 1530 kg.

Technical characteristics

- Pinion and cog rotation;
- Base attached to lower section of column in steel fusion;
- Guide shoes of extendable booms with "forced" assembly;
- Hydraulic extension booms with mpes extension;
- Boom connection system with single linkage;
- Rotating stabilisers with manual extension, also available in "xl" and "xxl" version;
- Centralised base lubrication system.

Electronic devices

Fassi Electronic Control System (FX)

F120B.1 e-dynamic



FSC Fassi Stability Control MOL

Manual
Outriggers Lock

control

CPM
Crane Position
Monitoring
control

D850 Digital Multifunction Distributor Bank RCH/RCS
Radio Remote
Control

FS Flow Sharing PROLINK
Progressive
Link
performance

MPES
Multi Power
Extension System
performance



NEWS

The new features consist of the inclusion of a linkage at the joint between the column and the main boom (F120B.1) and a possible second linkage (F120B.2) between the main boom and the secondary boom

The new **F120B.2**

Versions

- Version .21 with 1 hydraulic extension (5.70 m outreach) 1. Lifting capacity: 11.10 tm Weight: 1150 kg;
- Version .22 with 2 hydraulic extensions (7.75 m outreach) 2. Lifting capacity: 10.90 tm - Weight: 1260 kg;
- Version .23 with 3 hydraulic extensions (9.85 m outreach) 3. Lifting capacity: 10.50 tm - Weight: 1365 kg;
 - Version .24 with 4 hydraulic extensions (12 m outreach) 4. Lifting capacity: 10.30 tm - Weight: 1460 kg;
- Version .25 with 5 hydraulic extensions (14.10 m outreach) 5. Lifting capacity: 10.00 tm Weight: 1550 kg.

Technical characteristics

- Pinion and cog rotation;
- Base attached to lower section of columnin steel fusion;
- Guide shoes of extendable booms with "forced" assembly;
 - Hydraulic extension booms with MPES extension;
 - Boom connection system with dual linkage;
- Rotating stabilisers with manual extension, also available in "xl" and "xxl" version;
 - Centralised base lubrication system.

Electronic devices

Fassi Electronic Control System (FX)

Optional















The new **F125A.1**

Versions

- 1. Version .21 with 1 hydraulic extension (5.65 m outreach) Lifting capacity: 11.40 tm - Weight: 1130 kg;
- 2. Version .22 with 2 hydraulic extensions (7.70 m outreach) Lifting capacity: 11.00 tm - Weight: 1240 kg;
- 3. Version .23 with 3 hydraulic extensions (9.80 m outreach) Lifting capacity: 10.70 tm - Weight: 1345 kg;
- 4. Version .24 with 4 hydraulic extensions (12 m outreach) Lifting capacity: 10.50 tm - Weight: 1440 kg;
- 5. Version .25 with 5 hydraulic extensions (14.05 m outreach) Lifting capacity: 10.20 tm - Weight: 1530 kg.

Technical characteristics

- Pinion and cog rotation;
- Base attached to lower section of column in steel fusion;
- Guide shoes of extendable booms with "forced" assembly;
- Hydraulic extension booms with MPES extension;
- Boom connection system with single linkage;
- Rotating stabilisers with manual extension, also available in "xl" and "xxl" version;
- Centralised base lubrication system.

Electronic devices

- Fassi Electronic Control System (FX);
- Fassi Automatic Dynamic Control (ADC).

F125A.1 e-dynamic



FX500 Fassi Electronic Control control

FSC Fassi Stability Control control

MOL Manual Outriggers Lock

CPM Crane Position Monitoring control

D850 Digital Multifunction Distributor Bank control



















The new **F125A.2**

Versions

- Version .21 with 1 hydraulic extension (5.70 m outreach) 1. Lifting capacity: 11.50 tm Weight: 1150 kg;
- Version .22 with 2 hydraulic extensions (7.75 m outreach) 2. Lifting capacity: 11.20 tm - Weight: 1260 kg;
- Version .23 with 3 hydraulic extensions (9.85 m outreach) 3 Lifting capacity: 10.90 tm - Weight: 1365kg;
 - Version .24 with 4 hydraulic extensions (12 m outreach) 4. Lifting capacity: 10.70 tm - Weight: 1460 kg;
- Version .25 with 5 hydraulic extensions (14.10 m outreach) 5. Lifting capacity: 10.40 tm Weight: 1550 kg.

Technical characteristics

- Pinion and cog rotation;
- Base attached to lower section of column in steel fusion; •
- Guide shoes of extendable booms with "forced" assembly;
 - Hydraulic extension booms with MPES extension;
 - Boom connection system with dual linkage; •
- Rotating stabilisers with manual extension, also available in "xl" and "xxl" version;
 - Centralised base lubrication system.



- Fassi Electronic Control System (FX);
- Fassi Automatic Dynamic Control (ADC).

Optional









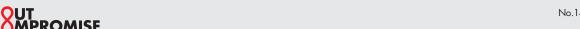














AS SERIES:

Speed and light

The AS series is a range designed for the German market which emphasises Fassi's philosophy of striving to meet the demands of each specific market by developing special series. It is a design experience that has evolved over time and which can be seen today in three basic models and three XP models. The most significant features are lightness and speed. In fact, one of the most important references of the German crane market is the construction sector. Compared to other countries, in Germany, the transportation of construction materials is organised following methods that are consolidated and standardised in load movement systems, which are part of the work culture in this industry. In order to meet the specific needs of the German market, Fassi has created the AS series; i.e. machines that are not foldable and never return to the typical rest position behind the cab, but rather remain extended on the loading area. In this way, the loading and unloading of palletised material can be done faster. The AS series currently includes 12 versions of cranes with capacities that range from 13 to 22 tm. They feature a long principal boom and can be equipped with a fork, orange peel grab and bucket. With these cranes, the well known Fassi quality meets the expectations of its users, especially the leaders of the German market, who frequently need rapid sequences of movement.

F145AS

Version .21 with 1 hydraulic extension (6.95 m outreach) Lifting capacity: 13.75 tm - Weight: 1950 kg

Version .22 with 2 hydraulic extensions (9.10 m outreach) Lifting capacity: 13.15 tm - Weight: 2075 kg

Version .23 with 3 hydraulic extensions (11.20 m outreach) Lifting capacity: 12.65 tm - Weight: 2200 kg

F215AS

Version .22 with 2 hydraulic extensions (11.10 m outreach) Lifting capacity: 22.00 tm - Weight: 2860 kg

Version .23 with 3 hydraulic extensions (13.65 m outreach) Lifting capacity: 21.10 tm - Weight: 3060 kg

Version .24 with 4 hydraulic extensions (16.15 m outreach) Lifting capacity: 20.40 tm - Weight: 3260 kg

F195AS



Version .22 with 2 hydraulic extensions (11.10 m outreach) Lifting capacity: 18.45 tm - Weight: 2720 ka

Version .23 with 3 hydraulic extensions (13.65 m outreach) Lifting capacity: 17.65 tm - Weight: 2920 kg

Version .24 with 4 hydraulic extensions (16.15 m outreach) Lifting capacity: 16.80 tm - Weight: 3120 kg

F160ASXP



ersions

Version .21 with 1 hydraulic extension (6.95 m outreach) Lifting capacity: 14.90 tm - Weight: 1950 kg

Version .22 with 2 hydraulic extensions (9.10 m outreach) Lifting capacity: 14.25 tm - Weight: 2075 kg

Version .23 with 3 hydraulic extensions (11.20 m outreach) Lifting capacity: 13.75 tm - Weight: 2200 kg

F210ASXP

Version .22 with 2 hydraulic extensions (11.10 m outreach) Lifting capacity: 22.00 tm - Weight: 2860 kg

Version .23 with 3 hydraulic extensions (13.65 m outreach) Lifting capacity: 21.10 tm - Weight: 3060 kg

Version .24 with 4 hydraulic extensions (16.15 m outreach) Lifting capacity: 20.40 tm - Weight: 3260 kg

F240ASXP



Version .22 with 2 hydraulic extensions (11.10 m outreach) Lifting capacity: 23.85 tm - Weight: 2860 kg

Version .23 with 3 hydraulic extensions (13.65 m outreach) Lifting capacity: 23.05 tm - Weight: 3060 kg

Version .24 with 4 hydraulic extensions (16.15 m outreach) Lifting capacity: 22.20 tm - Weight: 3260 kg

TECHNICAL characteristics



- moment limiting device
- multifunction proportional hydraulic distributor
- seat mounted to right of column
- seat stabiliser command
- MPES (Multi-Power Extension System)
- Prolink system in combination with linkage system
- High performance cog rotation system
- Secondary boom lifting outrigger protection
- Heat exchanger

ELECTRONIC devices

Fassi Electronic Control System (FX)





The benefits of the **GAS DEVICE**

The GAS (Grab Automatic Shake) device can be added to a wide range of light-duty cranes, from the F95A crane to the F245A crane, and is based on the software control of bucket movement when unloading materials. Benefits include the complete control of open and close movements with regular actions, including at high speeds, without experiencing uncontrolled reactions, which is also useful for ensuring that any material trapped on the bucket walls are unloaded. Thanks to this device, if the bucket open and close speed commanded by remote control is very high, regular movements can also be obtained at higher speeds, thanks to the automatic movement control system.



Fassi Ladekrane, 18 years of SUCCESS

Interview with Wolfgang Feldmann, Chief Executive of Fassi's German branch, which has been the leader in the segment of truck-mounted cranes in Germany for the past 18 years

A bridge that was built a little under 20 years ago has become an important point of reference for the Fassi Group. This bridge unites the excellence of Italian design and German efficiency. Fassi Ladekrane GmbH, the German branch of Fassi, has established its own space in the market of reference in a period of 18 years.

Fassi's partnership between Italy and Germany was established mid 1995 when Wolfgang Feldmann began working with Fassi as a consultant. In October 1995, Fassi Ladekrane GmbH was founded in Gründau-Rothenbergen and Feldmann is its current Chief Executive.

Since January 1996, the company has been officially responsible for the German market, launching product distribution and establishing itself as the leader in the truck-mounted crane industry.

Fassi Ladekrane is responsible for distribution, customer service, technical courses and supply of spare parts, along with its 12 partners.

Mr Feldmann, you are the beating heart of our branch in Germany, a market of strategic relevance for the Fassi group. This deep rooted link between Italy and Germany represents the synthesis of two fundamental elements



Fassi LADEKRANE

Today, the sales and customer care network of Fassi Ladekrane GmbH has nearly 40 partners

of Fassi DNA: the Made in Italy creativity and style with the Made in Germany efficiency and reliability... Would you agree?

We Germans love Ferrari sports cars and Italian cuisine, but it's difficult for us to purchase "Made in Italy" investment assets. We connect the "Dolce Vita" to a holiday on the riviera, but perquisites such as punctuality, reliability and quality are not seen as Italian characteristics.

FASSI

Fassi subsidiary Ladekrane GmbH in Gründau-Rothenbergen



01

We found ourselves with a market that invested little and demand was dropping. Our strength is our expertise of product post-sales organisation 02

The use of raw materials and the construction of nearly all steel parts for our cranes is our expertise

03

Since 1965, the Fassi family has successfully specialised in hydraulic truck-mounted cranes only and has continually put their profits back into the company

FASSI LADEKRANE GMBH

- Fassi's German branch has been responsible for the German market since January 1996. Today, the sales and customer care network of Fassi Ladekrane GmbH has nearly 40 partners.
- The central warehouse is located in the Reno-Meno region and the registered office is at Gründau-Rothenbergen.
- In addition to supplying spare parts, the German branch is responsible for training the technical staff of its partners across the German network. With a small, but effective, team, the branch supports the activities of all Fassi distributors in Germany.

But in Lombardy, the region in which Fassi is located, working rhythms are like ours. Work starts at 8:00 in the morning and finishes at 5:00 in the afternoon. We can only tell where we are from two typical Italian characteristics: brown shoes, that we don't wear, and restaurants that only fill up from 8:00pm onwards. The clients who visit our premises with us are very surprised and impressed with how German Fassi appears, particularly when they visit our production departments. Since 1996, we have been working on the Fassi Ladekrane image.

At the start, people were asking me if Fassi was the name of animal fodder, but today they don't ask me this question anymore.

Everyone knows what Fassi is and what it represents. Today, our branch is the number two of the German market and it plays an important role within the Fassi group. We can define it as Italian design with German precision.

Fassi has always strongly believed in the German market, as demonstrated by specific projects such as the AS/K series...

Specific cranes to move construction materials and orange peel grab cranes are so normal for us that we don't even realise that Fassi produces these cranes. Crane manufacturers do not deal with this segment, they take a secondary role in the German market.

The advantage of these cranes is that they can be seen anywhere on the streets and this has a positive impact on the level of awareness of the Fassi name.

In particular, the cranes used to move construction materials are enjoying an increased level of popularity and we could not imagine our roads without them.

For Fassi, the work we do in Germany is an important test because the context is very competitive and we can test the quality, efficiency and reliability standards that this market requires in the best conditions possible... What are the main duties of someone like you who works in this country, particularly in post sales services?

For the client, this is either the first Fassi crane they purchased or they are choosing this product again. Our clients value the personal commitment of all Fassi Ladekrane GmbH partners.

Our qualified response demonstrates our technical expertise and transmits a feeling of ability. We have a small, energetic and very efficient team that is able to support the needs of our clients.



Sometimes we omit the usual morning greeting in German and replace it with the very Italian "Buongiorno", something that helps our clients identify our partners with the Italian product.

In a decisively difficult international setting, the numbers demonstrate that the German market has, and continues to experience, a modest, but significant growth. What is behind this success?

The cake is not getting any bigger, but everyone wants a big piece. Our strength is our expertise of product post-sales organisation. When we entered the market in 1996, the strong impulse of economic growth triggered by the German reunification (up to 8000 new trucks were sold in a calendar year) was petering out. We found ourselves with a market that invested little and demand was dropping. We didn't grow with the German economic boom; we have always had to fight incessantly. This young organisation is never satisfied. It is always industrious. The second reason behind our success is our product and production. Fassi's construction expertise is fully controlled and monitored by the Fassi organisation itself. The use of raw materials and the construction of nearly all steel parts for our cranes is our expertise. The parts supplied by third parties, such as valves, di-

ITALY-GERMANY

Fassi's German branch can be defined as Italian design with German precision. A mix which allowed the Group to reach a lot of successes

stributors and remote controls are developed and tested with Fassi specifications.

The third reason for success is that since 1965, the Fassi family has successfully specialised in hydraulic truck-mounted cranes only and has continually put their profits back into the company.

As the important "Bauma" event will be held in Germany, what are the branch's specific marketing and communication strategies for the German market?

Bauma, as given by the name itself, is a trade fair for everyone in the construction business, which basically means potential clients for us.

There are a high number of industry journals and it is important to adopt a correct communication plan.

Our communication strategy is increasingly well defined, information must be presented in a coherent way in accordance with the topics discussed in the specialist journals. Fairs are naturally an essential part of Marketing. We mainly concentrate on important national trade

fairs such as the IAA Nutzfahrzeuge in Hannover, Bauma in Munich, Nordbau in Neumünster, Stonetec and Galabau in Nuremberg, etc. Another essential element is the centres for excellence of vehicle manufacturers, such as the BIC of Mercedes in Wörth, the BBC of MAN in Munich and the Democenter of Scania at Coblenza, where we have always been represented with various industry-specific set-ups.

You have always referred to skill and specialisation as the distinctive elements of your working philosophy. What other factors are paramount for the evangelisation of the Fassi brand name worldwide?

Personal commitment and total identification with the product. Working for Fassi is not an ordinary job; it's almost a vocation. Hygiene control is an important factor and only workers with a 3020 blood group are admitted! No, jokes aside, we require technical skill and expertise, not only of the hydraulic cranes, lorries and frames, vehicle

set-up and legal standards.

Determination and talent for sales are guarantees for commercial success. From my experience, a linear approach in consultancy is an important virtue. Promising the client a product for what it is alone is something that can actually be delivered.

Your extensive experience enables you to look to the future with the benefit of hindsight. How has the market changed today since your first days at Fassi?

The seller is experiencing a great change; a generational change of clients who try out and accept new products.



They change because the directives themselves change. Weight and the useful load, is the most important criterion. For clients interested in technique, Canbus and Fassi SmartApp are reasons enough to purchase.

You joined Fassi as the former sales manager of Jaguar. What have you brought from the automotive industry to your role within the crane industry?

Passion for technique and customer relations.

What message would you pass on to new generations who would like to build a career in the Fassi group?

An essential feature for becoming active in Fassi is technical expertise and skill, in addition to having a positive mentality at work. Always be authentic because the client quickly realises whether you are credible or not.

STRATEGIC Area

Another essential element is
the centres for excellence
of vehicle manufacturers, such
as the BIC of Mercedes in Wörth,
the BBC of MAN in Munich
and the Democenter
of Scania at Coblenza





Fassi Group, INNOVATION between present and future

INTERNATIONAL

Bauma has always been a privileged setting for discussion in the construction industry; an occasion to present the most innovative solutions to sector professionals from all over the world

Fassi Gru will be in Munich for the 30th Edition of Bauma, the most important international trade fair in the construction industry. From 15-21 April, the worldwide leader in the crane industry will be present with its most important new products: the Fassi F120B and F125A crane, which follow the F110B launched at SIAE 2012 with the single or dual piston system (identified with the codes F120B.1/F120B.2 and F125A.1/F125A.2 respectively) to further increase performance and efficiency. In the case of the light-duty F125A crane, the exclusive automatic dynamic control device will be available. The new F195AS Fassi's "Baustoffe" range model

FASSI GRU

The Fassi Gru stand will be located in the External North Zone, in the F8 Area, stand N827/3. Fassi will be present with F120B and F125A crane

currently includes 12 versions of cranes with capacities that range from 13 to 22 tm. These crane models have been designed to speed up the loading and unloading process of palletised material, particularly for the German construction industry. They feature a long boom and can be equipped with a fork,

tified with the letters

AS. The AS series

Fassi will be one of the protagonists at the 30th Edition of Bauma, the most important international trade fair in the construction industry. Among our new products, we will present the F120B, the F125A and F195AS

orange peel grab and bucket. With these cranes, the well known Fassi quality meets the expectations of the users, the leaders of the German market, who frequently need rapid sequences of movement. In the meantime, testimonials have been collected for the industry use of the Fassi SmartApp System, the first remote smartphone support service designed for crane industry. These are all aspects that are all very positive and help us imagine the significant benefits for users, in terms of practicality and work control. Bauma has always been a privileged setting for discussion in the construction industry; an occasion to present the most innovative solutions to sector professionals from all over the world. In fact, it is easy to predict that there will be greater numbers at Bauma 2013 compared to its 2010 Edition, which was affected by the ash cloud from the Icelandic volcano which limited air travel. 3256 operators representing 53 countries will be present at the 2013 Edition, with 420,000 visitors coming from 200 countries and a trade fair that will occupy 555,000 square metres of exhibition space. For Fassi, a company that is present in 60 world markets, taking part in Bauma is an opportunity to confirm its international vocation. The Fassi Gru stand will be located in the External North Zone, in the F8 Area, stand N827/3.

iden-



FASSI stand at the previous Bauma edition





SPONSOR of the Superbike 2013 World Championships

From revving engines to football. Behind the scenes of Fassi's sponsorships. Interview with Giovanni Fassi, Chief Executive of the Company from Albino









A photo of the race in Australia, at Philipp Island



Sponsor **FASSI**

Every Superbike race becomes for Fassi a small exposition to present its own cranes

Sport is made of challenges to be won, goals to be reached after tough trials, training, victories and losses. It is a common theme that recurs in the world of sports, but also in life and work. For less than 50 years, the Fassi Group has been in pole position in its sector.

Every challenge becomes a victory in terms of innovation and its brand has now become a synonym of quality on an international level. For this and other reasons, the Fassi Group has decided to take to the track and field with its brand to sponsor important sporting events. In the past, Fassi has sponsored teams such as Milan, Inter and Genoa, MKR Technology team at the European Truck Racing Championship and is the official sponsor of the Superbike World Championship 2013. In this interview, the Chief Executive of the Fassi Group, Giovanni Fassi, will tell us the reasons and goals behind this choice.

Sport, in its many facets, is part of the central character of our lives. For years, Fassi has chosen to use its brand for important sporting sponsorship initiatives. What does the company hope to achieve with these types of initiatives?

The main aim is to raise awareness of the Fassi name on an international scale. It is an industrial brand and not a classical consumer good so in this sense, sporting sponsorship enables us to access a new world with the hope of further increasing the appeal of the Fassi group.

Furthermore, sponsorship at these levels does not only involve marketing and publicity staff, but also the sales network. Let's take our entrance in Superbike as an example. Here, any event becomes a small trade fair for us because we have our stand and our cranes on show. So any event at the circuit becomes an occasion for us to involve clients.

The international scale of the brand obviously



affects sponsorship choices. What considerations are made within the sponsorship platforms to best represent the worldwide aspect of a company like Fassi?

The choices are always made by starting from the ways in which we can benefit from them. Superbike is a multistop circuit that takes place in many countries and continents worldwide. It

would be impossible to reach such a widespread target through local advertising online.

When dealing with sport, emotion and sharing are decisive factors for involving Fassi's public. In this way, the company can speak straight to the heart of people...

Exactly. Direct advertising does not

transmit passion and emotions, which, on the contrary, are found on the terraces of a stadium or in the paddock of a Superbike circuit.

What main feedback have you received over the years from stakeholders that you have involved in sponsorship projects?

In the past, we have also sponsored



Upcoming superbike EVENTS



14th april

Aragon - Spain



28th april

Assen - Netherlands



12th may

Monza - Italy



26th may

Donington Park - UK



9th june

Portimao - Portugal



30th june

Imola - Italy



21st july

Moscow Kaceway - Moscov

Passion&WORK

Any event can and will become an occasion for meeting and sharing a passion and will even become a place to talk about work away from the usual office setting

the Series A teams Milan, Inter and Genoa and our expectations were met. Football is a much followed sport in Italy and abroad and visibility is very high.

We are now embarking on a new adventure with Superbike in which the Fassi brand will be the protagonist of an international grand tour. What are your specific expectations for this project?

My hope is to be able to take many of our clients to see Superbike races, thereby primarily involving many of our dealers across the world. Any event can and will become an occasion for meeting and sharing a passion and will even become a place to talk about work away from the usual office setting. When passion and work meet, great results can be achieved

I will also go to Superbike which I have not followed a great deal until now, but I'm sure I'll like it.

Can you tell us a particular anecdote that you have experienced, which is linked to sponsorship events?

When passion meets work, the child in us might just come



out. I noticed this when we were sponsoring Milan, Inter and Genoa and I'm sure that I will continue to see it now and in the future with Superbike. It is great to be with people that you have come to know at work as focused and serious, who let their passion and their real nature come to the surface. It is part of being human. In the race held in Australia, on Phillip Island, we had received great exposure. The people who took part thanked us for the emotion they experienced and for us, that was already a success.

PROTAGONIST IN FOOTBALL





In the past, Fassi has sponsored teams such as Milan, Inter and Genoa. It's a way to enter with passion in a world that offers great visibility







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The cranes supplied by 600 Cranes Australasia Pty Limited are able to work in extreme conditions and are some of the "working arms" of Wissard research, an American project, which is also funded by NASA

In ACTION

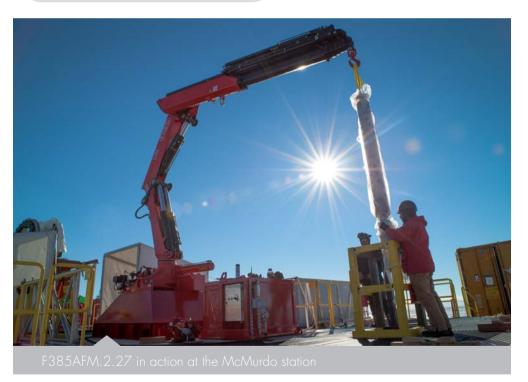
Fassi cranes were chosen for these operations above all for the reliability that these machines guarantee in extreme conditions, from desert to ice



Wissard is an American drilling project for geological deep analysis and inspection which aims to study microbial life and the climatic history of the Earth

The Fassi cranes used at the South Pole are searching for life from 500,000 years ago. In fact, the innovation and most advanced technologies of the leading worldwide group of cranes are involved in some of the most important research funded by the National Science Foundation and NASA, in which researchers of various origin, are taking part, particularly biologists, geologists, glaciologists and climatologists, from various US universities. We are talking about Wissard (Whillans Ice Stream Subglacial Access Research Drilling), an American drilling project for geological deep analysis and inspection which aims to study microbial life, the climatic history of the Earth and to understand the dynamic behaviour of the alaciers in Antarctica.

More specifically, in addition to the cranes used for logistic support, the crane in action at the McMurdo station (the largest Antarctic base of the project) is the F385AFM.2.27. The cranes at this base have been supplied by 600 Cranes Australasia Pty Limited, the Fassi importer for Australia, New Zealand and the Pacific Islands, located in Melbourne. With nearly 10 years' experience in the crane industry, 600 Cranes Australasia is a point of reference for organisers within its area and boasts a much appreciated multi-brand customer care organisation thanks to its





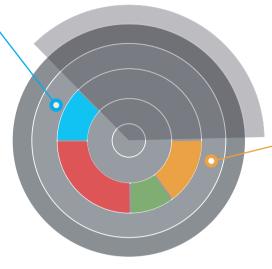
three branches. The cranes on caterpillar vehicles were set up by William Adams Pty Ltd, a Caterpillar reseller for the Australian states of Victoria and Tasmania, specialised in supplying tractors and machines for construction site operations in polar conditions. Fassi cranes were chosen for these operations above all for the reliability that these machines guarantee in extreme conditions, from desert to ice. And in this case we are talking about temperatures that drop to as low as -70°C. The Wissard project started more than 13 years ago and involved 10 years of research and three and a half years of technical preparation to start getting the first results today. In fact, over the past few months, the Wissard project has successfully completed drilling an 800 metre thick ice sheet that covers the Whillans subglacial lake, in the western part of the South Pole. The result has enabled the project to collect water samples and sediments



The crane used is the

F385AFM.2.27

Fassi crane, the F385AFM.2.27 chosen for prospecting activities. The base on which the crane is mounted was made in New Zealand



The 600 CRANES **AUSTRALASIA**

Is a point of reference for organisers within its area and boasts a much appreciated multi-brand customer care organisation thanks to its three branches





Fassi AT SOUTH POLE

The Fassi cranes used at the South Pole are searching for life from 500,000 years ago. In fact, the innovation and most advanced technologies of the leading worldwide group of cranes are involved in some of the most important research funded by the National Science Foundation and NASA

from a subglacial lake for the first time, which will now be analysed to collect information on various aspects. Special hot water probes were used for the drilling, which were equipped with a UV filtration and sterilisation system in order to prevent any possible contamination. The half-mile ice sheet that covers Whillans Lake is made up of snow that fell on the Antarctic thousands of years ago. A Fassi crane, the F385AFM.2.27 was chosen for prospecting activities. The base on which the crane is mounted was made in New Zealand and the sled in the USA.



Now your crane interacts at a single touch. Fassi is the first company in the lifting sector to combine the intelligent use of knuckle boom cranes with the use of the latest-generation smartphones. Fassi SmartApp is a veritable integrated system for real-time data collection and reading, capable of carrying out remote diagnostics of crane operation. A indispensable system to take full advantage of the capabilities offered

by your crane that allows you to optimise the crane maintenance schedule thanks to the utilisation statistics.



