

The Ravenhall Prison Development project is part of Victoria's prison expansion programme. Key features of the new Correctional Centre includes the capacity for 1,300 prisoners and a forensic mental health unit. A mix of low-rise accommodation, administration, health, industries, and recreation buildings. The development focuses on a new approach to corrections.

John Holland's professional experience is evident at the \$650 million Ravenhall Correctional Centre in Melbourne's west, where forward thinking, efficiency, advanced technology, and a row of firsts combined to build a correctional facility that is an essential part of Victoria's prison expansion programme.

John Holland are specialists in building and infrastructure construction in Australia, New Zealand and South Asia. The new prison has a capacity for 1,300 medium security male prisoners and, as Victoria's flagship prison, focuses on a new approach to corrections in Victoria. The inclusion of a 75-bed specialist forensic mental health unit is integral to the State's policy of encouraging and providing for a new attitude towards mental health in correctional facilities.

To further the goal of community connection to address isolation and cultural concerns, the design includes a central spine for the shared-use facilities containing health, education, professional visits and cultural and recreation facilities. The prisoner accommodation is configured as a series of secure residential communities. "John Holland worked with government, community and professionals to balance architectural aesthetics, operational requirements, security, functionality and cultural sensitivities with a high level of flexibility," said Connie King, Director at John Holland. "John Holland is fortunate to have the support of its experienced staff and subcontractors, all of whom have been on the journey from the tender phase. These teams worked together to deliver the required outcome and hand over a facility in which we can all take pride."

Victoria's vision to provide additional capacity in the State's prison system, reduce reoffending, provide specialist forensic mental health services, and encourage innovative practices to support efficient and cost-effective management, presented significant design challenges for the GEO consortium.

John Holland set about solving these challenges and succeeded. To this end, and a first for Australia, the construction involved the use of prefabricated modular cells. At peak production, three modules – which equates to up to nine cells – were cast, painted and fitted out each day. Installation involved the use of a 600T hydraulic crane. During the design phase in 2015, John Holland went through an extensive cell prototype review process, of the new cell layout design with the Department of Justice and Regulation.

The immense scale of services infrastructure at Ravenhall is notable by any standard. The combination of electrical, communication, mechanical, hydraulic, security and drainage systems is budgeted in excess of \$230 million. The site has an in-ground network of electrical conduits and hydraulic/mechanical pipework so extensive, that if the pipes were placed end-to-end, they would measure more than 140km in length. This circuitry of services links 46 buildings and numerous external components, over the 90-acre site.

John Holland also catered for more than 5,000 security protection devices to be installed, ranging from bio-metric tracking systems, extensive CCTV coverage, access card readers, electronic tracking key safes, anti-ram vehicle protection, prisoner movement detection and tracking systems.

Sustainability principles were fundamental to the design. The project was required to achieve two distinct environmental sustainable development

(ESD) ratings. The adjacent Statewide services building achieved both a 5 Star Design and 5 Star As-built Green Star rating, as awarded by the Green Building Council of Australia.

In the other 45 buildings, environmental efficiency ratings set by the Victorian Prisons Sustainability Scorecard Scheme, were achieved on water conservation, energy efficiency and indoor environment quality. With regards to sustainability onsite, John Holland, in keeping with the scorecard scheme, ensured that at least 80% of construction waste was reused or recycled, that topsoil be protected and re-used, and that flooring, joinery and furniture installed met environmental innovation sustainability requirements.

The energy efficiency of the cold storage (food refrigeration) systems, the provision of composting systems for food waste and the use of WELS rated appliances also had to achieve benchmarks. Ravenhall prison has a 400 kWp solar farm, a tri-generation plant, and significant water reuse infrastructure, including onsite detention for a 100 year ARI storm

For more information contact John Holland, Level 5, 380 St Kilda Road, Melbourne VIC 3004, phone 03 8698 9400, fax 03 9696 1873, website www.johnholland.com.au

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WALLED IN

Westkon Precast has a reputation for delivering high quality, high volume engineered precast concrete for structural and architectural elements, integral to major infrastructure and building projects.

An innovation introduced to Australia by John Holland, Westkon Precast bought three decades of experience to the Ravenhall Correctional Centre project, Westkon Precast pre-fabricated a total of 340 modular cell blocks with numerous configurations. The modular cell blocks were critical to allowing the project to be delivered within the tight construction programme.

With John Holland, the Westkon team was involved in the design of the precast manufacturing moulds for the modular prison cells and were casting one module per day per mould. The team completed all the cells in nine months, with three moulds running at the peak of the project.

"To ensure the programme could be met, Westkon had to introduce solutions to increase fabrication efficiency," explained CK Tan, Project Manager for Westkon Precast. "Westkon's design team worked with John Holland, their designers and Australian Reinforcing Company to develop a number of innovative solutions, including an engineered mesh solution that enabled daily cast cycles."

The delivery of cost-effective and timely construction is essential for the prison expansion programme in Victoria as CK explains, "The casting of these units as whole modules has not been done previously in Australia, where traditionally units have been constructed using individual panels and slabs. The modular approach reduces the installation time as the need to 'structurally connect/brace' the individual precast elements onsite is significantly reduced."

Westkon Precast supplies precast panels, beams, columns, hollowcore and even complete precast structures for commercial and residential structures and precast barriers, bridge beams, headstocks and panels for infrastructure projects. Hollowcore concrete has unique benefits in thermal and acoustic insulation.

Westkon Precast offers a total solution for customers, from concept design through to onsite installation. Combined with their dedicated transport fleet and a product design and engineering service, Westkon Precast has developed and implemented systems to meet the requirements of the ISO standards, current OHS acts, regulations and Australian Standards. The company has also held national prequalification since 2010 under the amalgamated 'Austroads' scheme.

Westkon Precast has been involved in a wide range of projects over their 30 years of operation. "While we have been producing hollowcore for well over 20 years, in the past couple of years we have made a significant investment in our hollowcore production facility," said CK.

The upgrade of the batching facility included the installation of a fully automated concrete production and transportation system installed, along with a new automated slipformer and production equipment. The upgrade allows Westkon Precast to expand it products to include the largest range of prestressed planks in Australia (Miniplanks 80mm to 150mm and Hollowcore 150mm to 500mm).

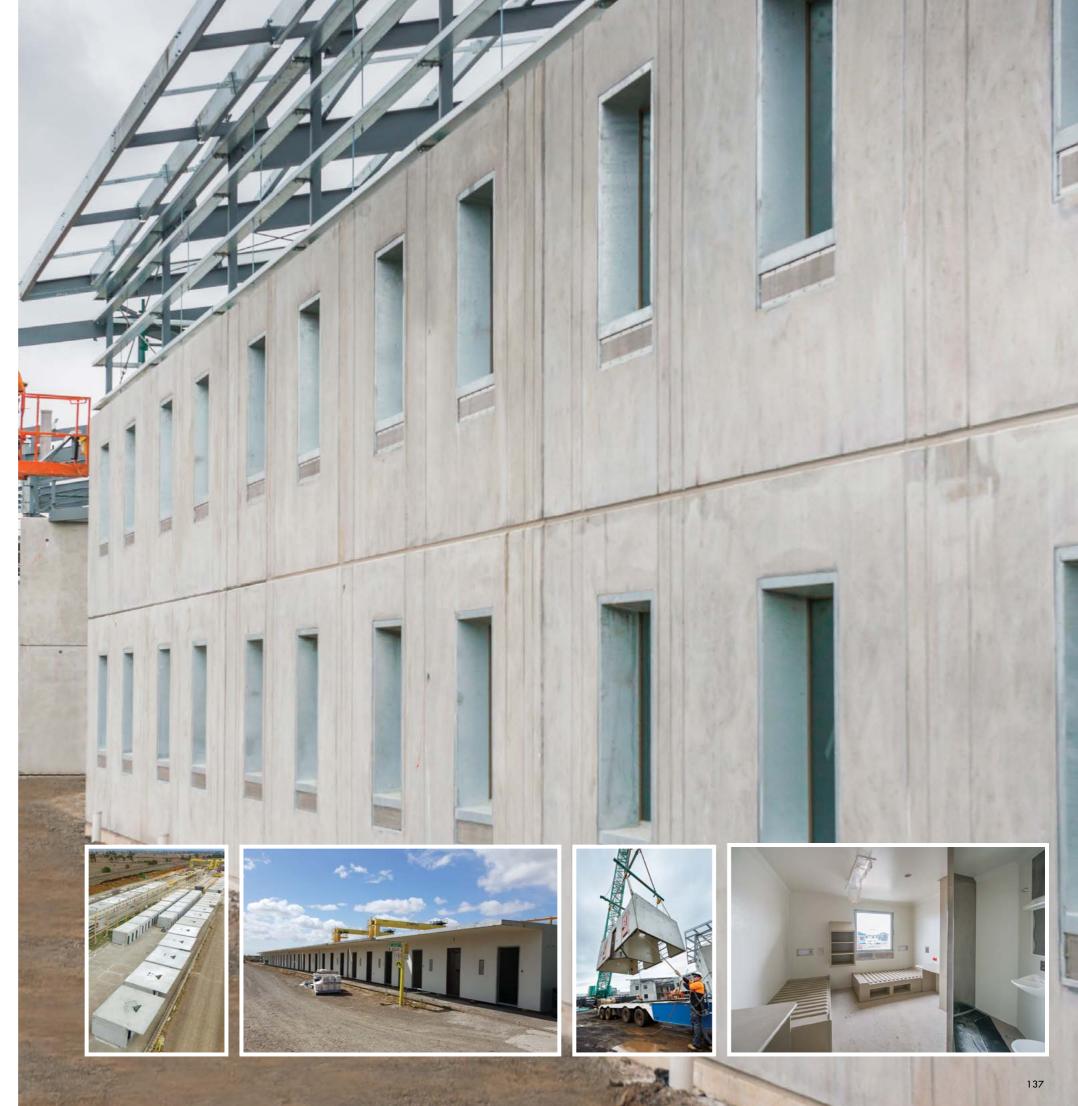
With an extensive range of components and high standards of service delivery, Westkon Precast is a proven choice for specialised production related to roads, bridges, industrial and high rise apartment projects, hospitals, stadiums and marinas. CK elaborates on the Westkon Precast portfolio, "While the majority of our projects are within Victoria, we have also been involved in supplying to a number of projects throughout New South Wales and South Australia, including jobs in Holbrook, Tarcutta, Darling Harbour as well as Sydney's CBD."

Recent projects completed by Westkon Precast since they upgraded, includes the latest stage of Simonds Stadium Redevelopment, the Artemis Project at Melbourne Girls Grammar, the new Sports Centre at Camberwell Grammar and it is currently working on five new stations for the 'Skyrail' project between Caulfield and Dandenong.

"Our portfolio also embraces the CityLink Tullamarine Widening Project, the Caufield to Dandenong Level Crossing Removal Project, as well as residential apartments such as Bolte Terraces, Swanston Central, Southbank Place and Empire Apartments," said CK.

For more information contact Westkon Precast Pty Ltd, 133-199 Ferris Road, Cobblebank VIC 3338, phone 03 8746 1300, website www.westkon.com.au











HOME SAFE HOME

As specialists in coordinating supply and installation solutions for industrial workplaces, Actisafe supplied all the furnishings for offices, common rooms, educational facilities and workshops at the Ravenhall Correctional Centre.

Actisafe provides furnishings, fittings and custom designed workstations for a wide range of residential and commercial projects. "We supplied all the movable furniture, casements, chairs, tables, wardrobes and pin boards, whiteboards and wallboards for all the buildings, including health amenities and industrial production facilities," said Marcus Bird, Actisafe's Project Manager. "The fitout was all tamper proof. Our approach was to communicate a lot with the client and, as such, there were no major issues on the job."

In a prison, the range of furnishings and equipment is diverse. "A minor challenge Actisafe encountered on the Ravenhall Correctional Centre project was logistics and delivery. This was easily overcome by the use of Actisafe's own warehouse no more than 5 minutes from Ravenhall Correctional Centre," Marcus explained.

Actisafe usually supply its products towards the end of the project, and as a manufacturer, is able to provide full packages - specifically FF&E (furniture, fittings and equipment packages), tailored to the final space.

"This type of service begins with consultation about layout and strategies for human-centered design and ergonomic solutions and culminates with management of precision installation," explained Marcus. "This is not only convenient for our clients but also very time efficient, allowing the client to rely on Actisafe to provide all the items necessary to complete the project on time."

Correctional facilities need high security seating and tables for dining rooms. Cells and common rooms require toilet bases and mirrors, specialised bedding, clothes lockers, TV cabinets, bookcases, plastic cell chairs and mounded chairs. Workstation furniture includes storage and filing cabinets and desks, ergonomic desk chairs and adjustable stools with back support.

Visitor's areas need to cater for children including the provision of children's chairs. Actisafe also supplied a range of tables to cater for the multiple tasks that are performed on a daily basis in a prison, including coffee tables, board room tables, meeting tables, hand-over tables and folding and sorting tables. Add to the list, outdoor furniture, staff furniture and trolleys for moving items around the prison, not to overlook provision for specialist tasks such as weapon storage and it is easy to see that this is a job for an experienced team of specialists in FF&E manufacture, supply and installation.

As a manufacturer of custom-made products, Actisafe offers FF&E for workshops, offices, hospitals and aged care facilities and workplace solutions for bars, brewerys and public areas. In the accommodation and hospitality sectors, Actisafe supplies furniture for bedrooms, bathrooms, commercial kitchens and dining centres. Actisafe is also an experienced supplier in the educational sector.

Actisafe can also supply assembly lines and flow-through shelving, workstations and storage solutions in the workplace. In many instances there is a need to customise the workshop in order to provide for special circumstances. Actisafe offers a 'custom, supply, install and management' system that takes responsibility for the total fitout from concept to installation.

In business since 2008, Actisafe has a commitment to Australian-made products, however it will occasionally source required products and services from overseas if necessary. As a Defence Accredited supplier, Actisafe has supplied defence departments with furniture, fittings and equipment for complex projects across the range of defence services.

Actisafe is also the suppliers for prison sites in Auckland and Wellington in New Zealand, and Parklea in New South Wales, and is working on the defence project 'Growler' at Amberley RAAF base in Queensland.

For more information Actisafe Pty Ltd, 5 Rosella Street Singleton NSW 2330, phone 1300 852 397, website www.actisafe.com.au

LIGHTING THE WAY

Rexel Australia has been in the Australian Electrical Industry for over 100 years, its long standing history is a testament to the exceptional quality products, expertise and knowledgeable service that its people provide. Rexel continues to adapt and keep up to date with increased competition and customer demands, providing a leading range of lighting, cable, network and energy saving solutions.

The team at Rexel Australia offer superior problem solving and assistance to help its customers. Its innovative approach to finding solutions to any industrial problem comes from experience across a wide range of industries, servicing the automotive, chemicals, food and beverage, government, hospitality, manufacturing, mining, minerals and metals, oil and gas, printing and packaging, pumping and irrigation, public infrastructure, service, transport and utilities industries.

The company prides itself on meeting the customer's expectations with a high level of project assistance. The ability to provide efficiently correct stock availability, deliver on time and offer competitive pricing, were stand out qualities for Rexel's involvement on the Ravenhall Correctional Centre.

Rexel delivered innovative and cost effective solutions in the supply of lighting and electrical products for the Ravenhall Correctional Centre. Rexel's dedicated lighting product specialists assisted in the selection of the light fittings. Since it was a prison installation, it was also important that all light fittings and electrical installations were fitted safely and securely so that they cannot be damaged or removed easily by inmates.

The light fittings had extensive and diverse features, which were chosen to suit the particular area and application where they were being installed. Consultation with lighting manufacturers and careful consideration regarding the performance and appearance of the light fittings selected were paramount to the end result.

All the lighting fixtures, exits and emergency fittings that were chosen, met the required

specifications for the project. In conjunction with Rexel's preferred partner suppliers, quality and technically proficient products were strategically chosen to meet specific conditional requirements.

For the Ravenhall project, it was critical to ensure that all product deliverables were made available onsite by the required due dates in order to meet project expectations, which was the main challenge that Rexel experienced considering the sheer size of the project and the high number of delivery dates.

Nonetheless, Rexel applied its extensive experience and worked closely with all suppliers, using a high level of project planning, and with contingency plans to assist in countering any unforeseen delays, which ensured that the project was completed on time.

With the help of the main office staff, Rexel had two people onsite ensuring that the supply and installation of its products were managed accordingly. The supply of products commenced in January 2016 with the final bits and pieces delivered by July 2017, though the main bulk of supply and installation was completed a couple of months prior.

"The most positive aspect of this project was that given time and project management considerations, Rexel supplied and delivered a measured turnkey solution in line with meeting all the expectations and requirements for our customers in providing the desired project outcome," said Eddie Nastasi, State Sales Manager for Rexel Victoria.

Rexel provides its products and services across Australia with a branch network of 144 locations and flexible delivery options. Branch teams regularly liaise with both contractors and suppliers on large projects such as prisons, hospitals and shopping centres, as well as many smaller project like schools, offices, retail and wholesale outlets.

For more information contact Rexel Australia, First Floor, Building B, 12 Julius Avenue, North Ryde NSW 2113, phone 02 9887 6222, website www.rexelha.com.au



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Downer is Australia's biggest engineering and services contractor with more than a century's experience delivering Australia's best projects.

Our strength lies in our ability to deliver challenging, complex and diverse projects, our partnership approach to customer relationships and our commitment to our people and their careers. With over 56,000 people across Australia and New Zealand and around \$22.5 billion worth of work in hand, Downer has the capability to deliver any project anywhere in Australia.

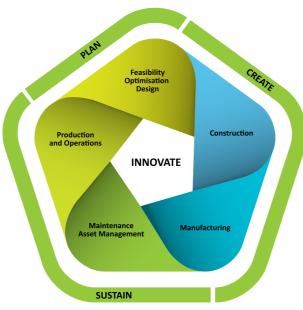
Downer provides services to customers in markets including:

- Transport Services;
- Rail:
- Utilities Services:
- Mining:
- Technology and Communication Services; and
- Engineering, Construction and Maintenance.

Our expertise

At Downer, we support our customers through the life of their assets - from initial feasibility and design through to production and operations and eventual decommissioning.

We aim to employ the best people and bring thought leadership to each stage of the asset lifecycle as we support our customers to plan, create and sustain.



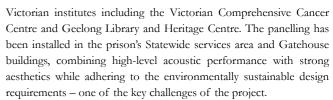




we've built a strong reputation for our knowledge, expertise and service. We also remain committed to innovation and research, ensuring our product development continues to respond to the needs of today's design and construction industry."

Atkar Group's three leading architectural product ranges - Infinity, Quantum and Horizons - include an extensive selection of acoustic panels, decorative panels and modular cost-effective panels. With the ability to fully customise products and finishes, the company's acoustic panels proved the right fit for the prison's specialised project requirements, and unique technical considerations.

Working closely with John Holland and its architect Guymer Bailey, Atkar Group supplied Au.diSlot and Au.diPanel acoustic panels from their premium Infinity range, the same panels featured at other

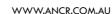


Recognising the importance of supplier dependability in major infrastructure projects, Atkar Group's superior service offering has provided onsite assistance and technical support to the build, while their local manufacturing has made shorter lead times possible, helping to ensure the project remained on track for its opening.

Atkar Group's unrivalled experience in supplying locally-made architectural and acoustic panelling systems, and deep understanding of the complexities of infrastructure design and construct, is helping to ensure that the Ravenhall Prison will be the world-class correctional facility Victoria needs.



For more information contact Atkar Group, 17-19 David Lee Road, Hallam VIC 3803, phone 03 9796 3333, fax 03 9796 3389, email, enquiries@atkar.com.au, website www.atkar.com.au



LOCKED DOWN

Sentinel Group, specialists in security and architectural fasteners, supplied Prolok screwbolts for the Ravenhall Correction Centre. Sentinel worked closely with the installers to securely fix cell furniture to floors and walls

Supplying Prolok screwbolts, Sentinel Group brought an innovative solution to a tricky and potentially time-consuming problem. The use of screwbolts instead of hammered in anchor pins to secure items to the concrete slab floors reduced costs, installation time and demonstrated the advantages of this type of security fastener in prison construction.

Each cell at Ravenhall has beds, desk and shelves that need to be securely anchored to floor and walls. In a construction that provides the capacity for 1,300 prisoners in single and dual occupancy cells,

there are literally thousands of places where fittings are bolted to masonry and require a high security finish.

In a test cell at Ravenhall, the use of a traditional bent pin or hammer-in anchor blew out the side of the concrete wall. This was due to expansion when the anchor pin is hammered in near to an edge. The important benefit of a screwbolt is the reduced minimum edge distance because you are not dealing with expansion forces.

Sentinel Group, based in Victoria, has been supplying solutions for security and architectural fastening since 2004. Work proceeds on other custodial projects in Wellington, Cessnock and Grafton for the New South Wales prison system.

Reuben Stewart from Sentinel Group expands on the advantages of the solution that Sentinel Group provided at Ravenhall, pointing out the cost-effectiveness, "Our role was to supply a solution that eliminated issues like cracking of concrete and installer fatigue."

"It is worth noting that in addition to solving this issue we were also able to achieve a cost reduction for the installers of approximately one third of the cost of other anchor systems. This is significant on a large project like Rayenhall," said Reuben.

For more information contact Sentinel Group, 235 Woodward Road, Golden Square VIC 3555, phone 03 5445 3200, fax 03 5444 2200, email sales@sentinelgrp.com.au, website www.sentinelgrp.com.au





NO BLIND SPOTS

Architecture & Access is a company that works with architects, construction companies and building surveyors. A team of 12 access consultants are based in the Melbourne office at Parkville, with additional offices located in Brisbane and Adelaide. The company has a broad portfolio and has worked on major projects including Victorian Comprehensive Cancer Centre and Queensland Rail. Smaller projects include apartment buildings, schools, offices, and swimming pools.

Working on the Ravenhall Prison project has been both challenging and rewarding. This facility requires the same level of access for people with disabilities as for any other building while maintaining the necessary security required within any prison environment.

The building users – prisoners, operational staff, non-operational staff and visitors all require differing levels of access.

As with all public buildings, areas used by visitors and non-operational staff are required to comply with the Disability Access to Premises Standards, the Building Code of Australia and its referenced Australian Standards. Secure areas deviate from these regulatory requirements in instances where security and safety may otherwise be compromised and are required to comply with the Cell & Fire Safety Guidelines.

This included the design of fixtures such as grab rails, which are anti-ligature but still allow a person who has a disability or is ageing, to independently hold and use the rail. At stairways, open risers are featured



to ensure there are no blind spots for surveillance. Fully complying contrast nosing strips and tactile ground surface indicators were installed to meet the needs of prisoners with vision impairments.

Additional features were included within the prison such as accessible benches to tea points and kitchen areas. Clever design allowed operational staff to have few physical restrictions that would affect their ability to perform their role. Officer posts were raised above floor level to provide better sight lines, a handrail and contrast nosings are included on all steps for improved safety.

For more information contact Architecture & Access, Level 5, 369 Royal Parade, Parkville VIC 3052, phone 1300 715 866, fax 03 9347 5982, email info@architectureandaccess.com.au, website www.architectureandaccess.com.au

WIZARDS ON HAND

Rondo Building Services supported the product design and supply of construction materials at the Ravenhall Correctional Centre. Rondo Building Services worked with the principle teams at the Ravenhall Correctional Centre during project delivery.

Rondo Building Services has over 50 years of experience manufacturing walls, ceilings, access panels and lighter gauge rolled steel products for construction. It is able to supply lightweight and heavy duty framing for both internal and external walls and ceilings, and seismic walls and ceiling systems for critical areas. All Rondo Building Services' products meet the Australian and New Zealand Standards and code requirements, and are quality tested and assured and they work across a wide-ranging portfolio of projects in every state in Australia, New Zealand, Malaysia and India.

"Most of the challenge at Ravenhall was product design and development, as it is the largest correction facility we have undertaken. Our role with product supply and weekly onsite inspections ensured no time delays in construction. We were even able to replace products that John Holland was initially using which meant reduced costs," said Charlie Khoury, Sales and Development Manager at Rondo Building Services. "We were more than happy with the way the project panned out, especially in our ability to support the builder and construction teams."

The main manufacturing plant and technical services team at Rondo Building Services is situated in Erskine Park, New South Wales with distribution centres in Victoria, Western Australia, Queensland and South Australia. Rondo Building Services has extensive experience in building design and supply, including work on hospitals and medical centres, schools, hotels, residential apartments, commercial spaces and sporting facilities.

"There were 46 buildings at Ravenhall with capacity for 1,300 prisoners to meet possible future demand," said Charlie. "Rondo seems to be the supplier of choice on many large government projects due to the resources and technical expertise we bring and the speed with which we get products to site."

"Our comprehensive design assistance service makes us a market leader in this area," explained Charlie. "We worked very closely with John Holland supplying seismic ceiling designs for the Queen Elizabeth ll Medical Centre and they were keen to use us again. We enjoy a good relationship with John Holland."

For more information contact Rondo Building Services, phone 1300 367 663, website www.rondo.com.au





MAKING A SWITCH

Lai Switchboards Australia contracted to work on the Ravenhall Correctional Centre, designed, engineered, manufactured and supplied around 380 400VAC main switchboards, main distribution boards and light and power distribution boards.

At the request of Downer Group, Lai designed several prototype distribution boards to incorporate a plug-in "soft" wiring system. This involved distribution board capacity of 24 pole up to 108 pole inclusive of integrated lighting control, energy management metering, fully wired with a simple plug-in system for final sub-circuits. This saved time around on-site installation and fit-off.

"Lai provided 3D modelling for prototypes enabling the client a much more detailed view of the new designs, reducing approval times and design-to-machine times," explained Matthew Benstead, Lai Switchboards' Victoria Manager. "Designing a new soft wiring switchboard system from scratch and putting it into production to meet lead times was challenging but also very rewarding to see completed." Lai Switchboards' highly experienced design team was able to get designs out early and its production team was able to accelerate delivery to meet the client's requirements.

"Lead times are always a big challenge for major construction works, but using volume production techniques, the best people and the latest equipment, we were able to ensure the fastest possible turnaround," said Matthew. "We were very pleased to be given the opportunity to work with Downer and John Holland on the project and have continued to get more opportunities in the market as a result."

Specialising in the manufacture of switchboards, substations and pre-fab switchrooms, Lai Switchboards has been in business since 1969. The company has facilities in Campbellfield, Victoria, Hendon, South Australia, Auburn, New South Wales and Lytton in Queensland.

"We are a family-owned and operated business with approximately 200 employees, one of the largest and most experienced switchboard and pre-fab switchroom manufacturers in Australia," said Matthew. Lai Switchboards is also working on Air 7000 Edinburgh, Darling Harbour Live and Metro Rail projects.

For more information contact Lai Switchboards Australia, 4 Transit Drive, Cambellfield VIC 3061, phone 03 9380 7000, fax 08 8244 9122, email sales@laiswitchboards.com.au, website www.laiswitchboards.com.au

FRAMED

Scaffold Logistics with almost five decades of experience in scaffolding, rigging, fabrication, and high risk work was engaged at Ravenhall Correctional Centre to provide a highly tailored scaffold package to the site. "We were involved from conception with a comprehensive operation, full design and our own engineering," said Ian Douglas, Operations Manager for Scaffold Logistics. "We are fully self-sufficient and this means we can deliver the required volume on time, when the demand comes through and work is at peak with no shortage of materials or workers."

Respected in the industry for its dedication to health and safety, Scaffold Logistics has Australia and New Zealand 4801 Accreditation and specialises in advance planning to identify risks and minimise cost. "We ensured safe access to all roofs at Ravenhall that meant advanced scaffolding with 70-80 scaffolds installed. We got a good rap at Ravenhall for building scaffold safely; we are fully compliant with Workplace Health and Safety requirements," said Ian.

Delivering a comprehensive service defines Scaffold Logistics, ensuring quality assured performance and on-time, on-budget supply of materials and workforce. "This is achieved by managing all aspects of the job. At Ravenhall the size of the job itself was the logistical challenge. We provided stretcher stairs and access platforms."

Ian explained that their services including engineering, design, transport, labour and materials are all housed under one roof and fall under their accreditation. Large infrastructure projects like the Ravenhall Correctional Centre benefit from an approach that is 'start to finish' inclusive, covering pre-start evaluations, design, engineering and site logistics; and managing workforce requirements with a strong culture of cooperation with all involved.

Scaffold Logistics has a proactive approach to best practice, including a commitment to ISO 9001 quality assurance, that means continual internal development and improvement of ongoing systems and performance. With extensive experience in providing access and support solutions. Scaffold Logistics has facilitated building at the Westgate Bridge strengthening project, BAE Shipyards, Longford Gas Plant, Suncorp building demolition and the Level Crossing Removal Project Sky Rail (CD9).

Recently Scaffold Logistics has undertaken a number of rail projects, involving the construction of Blackburn, Huntingdale, Bayswater, Williams Landing, Balaclava, McKinnon and Ormond Stations, as well as current works on Mernda Line, Hurstbridge Line and Skye Road.





KEEPING IT RUNNING

The complexity of electrical and communication circuitry, sewer networks and security conduits required for a prison development is mind-boggling, and Rangedale were required to locate these underground services safely and efficiently.

At Ravenhall Correctional Centre, Rangedale used hydro excavation to locate these services. The prisons location allows family to access the prison and give prisoners a greater sense of community, however the urban placement meant work on drainage and support systems must be highly specialised and reliable.

Rangedale are experts in drainage maintenance and civil repair services, providing contracting services to water retailers, councils, shires, developers and contractors.

"We have sufficient labour resources and equipment to give us capability to allocate high priority and emergency works, operate 24/7 and provide timely completion of works in high traffic areas or in relation to high flow pipes that are accessible at night only," explained Matt Kermeen, Operations Manager at Rangedale.

"All our field staff have competency in OHS Construction, Confined Space Entry & Rescue, Traffic Control & Management, First Aid Level 2, and are trained in contractors online Inductions. Our key personnel have competency in Spotter, Excavation, Trench and Shoring, and Asbestos Removal class B."

With 14 years experience, Rangedale has a strong commitment to safety on the environment and can tackle jobs that other drainage companies will not consider. Rangedale's impressive portfolio includes the John Holland Metro Tunnel project, Ringwood and Mitchem railway stations upgrages, the Fulton Hogan M80 Ring Road widening and the regional rail duplication.

With a staff of 130 employees, 110 in the field, Rangedale placed 18 people on the Ravenhall Correctional Centre.



For more information contact Rangedale Drainage Services, 25-27 Salta Drive, Altona North VIC 3025, phone 03 8368 8888, email info@rangedale.com.au, website www.rangedale.com.au