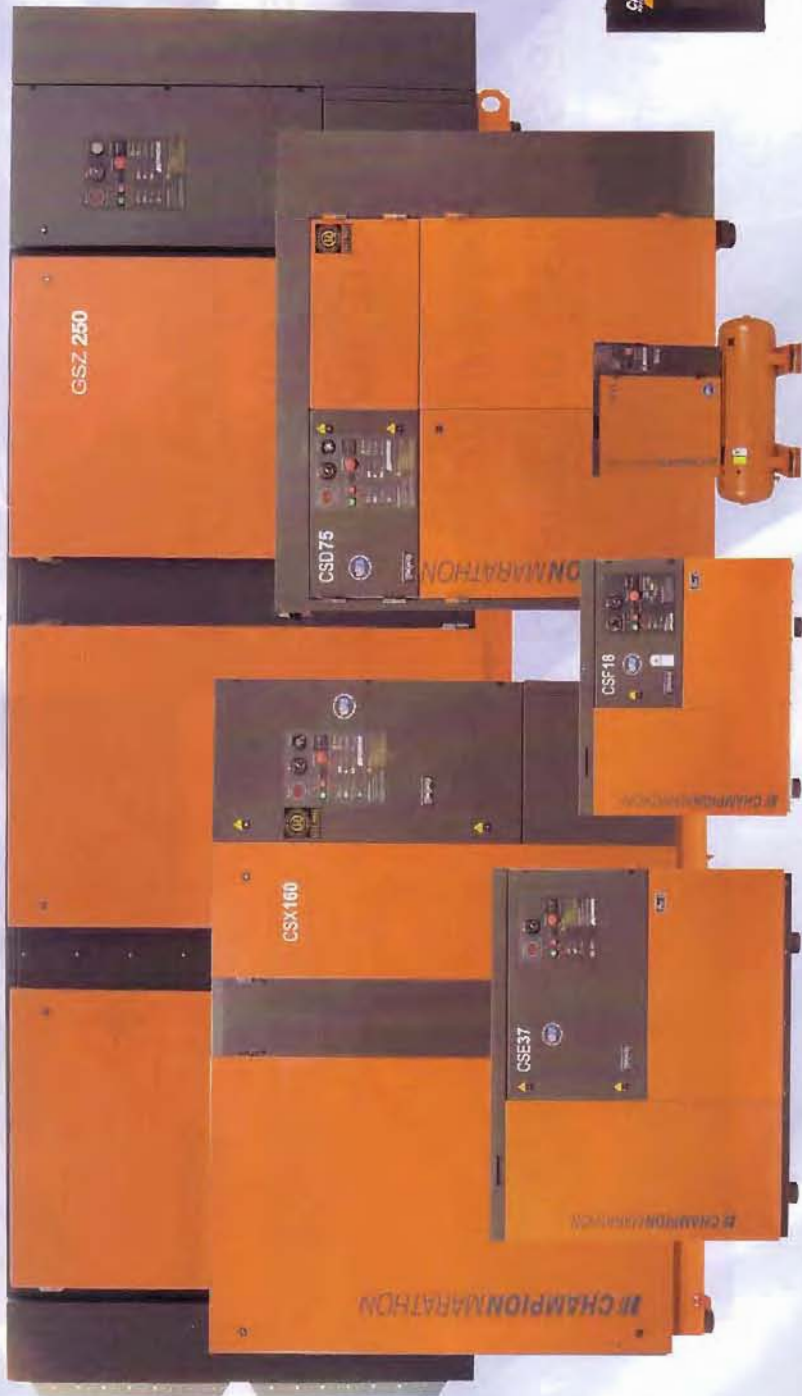


CHAMPION

COMPRESSED AIR & COOLING SOLUTIONS



CHAMPION
CHILLERS

CHAMPION
GENUINE PARTS

CHAMPION
REFRIGERATED DRYER

An Australian Manufacturer



The Olgas



The Great Australian Bight

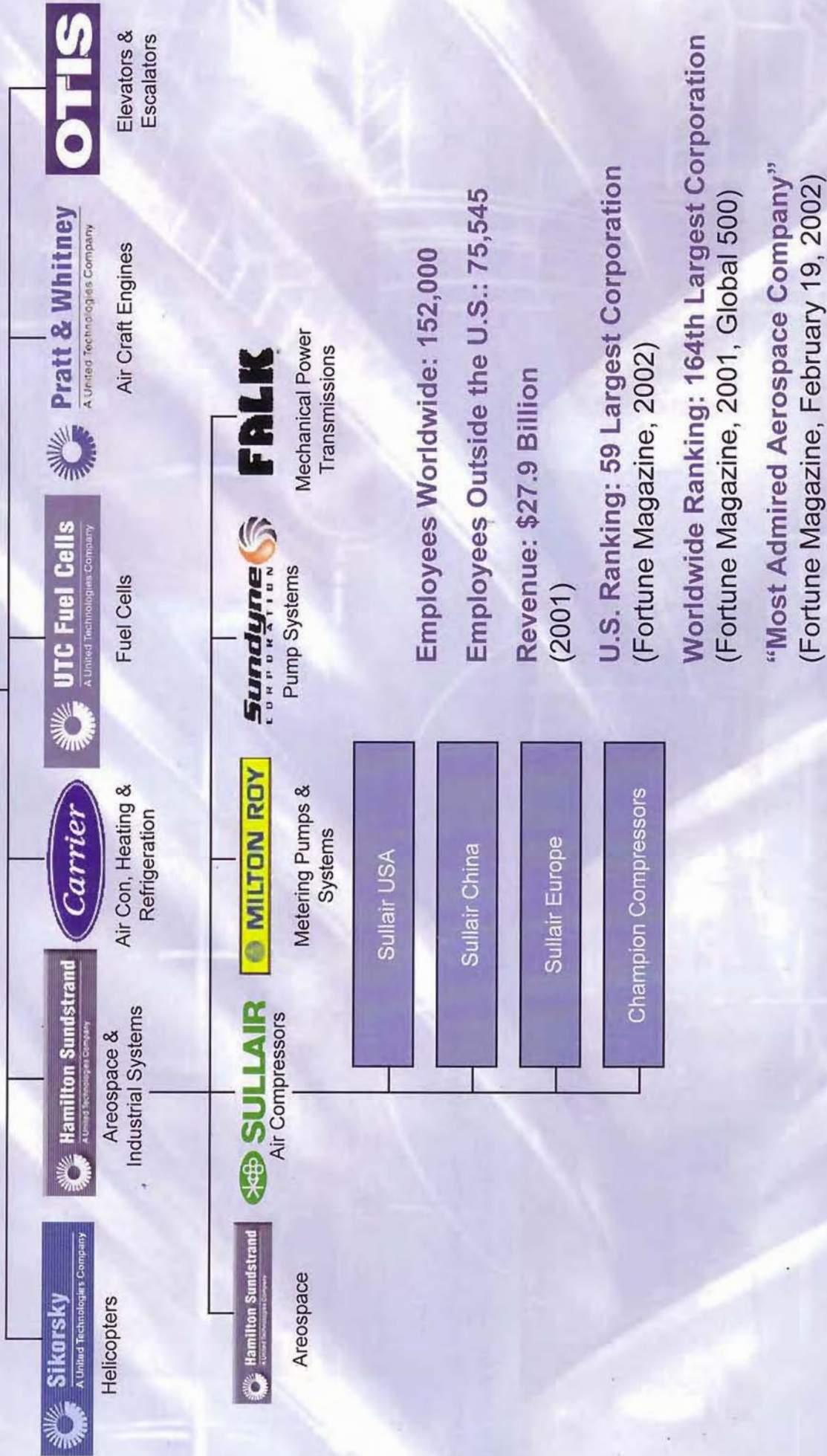
Champion Designs and Manufactures
it's Compressors in Australia.

Hence, we are in a unique position to
incorporate our understanding of hot,
harsh climate needs into our machines.

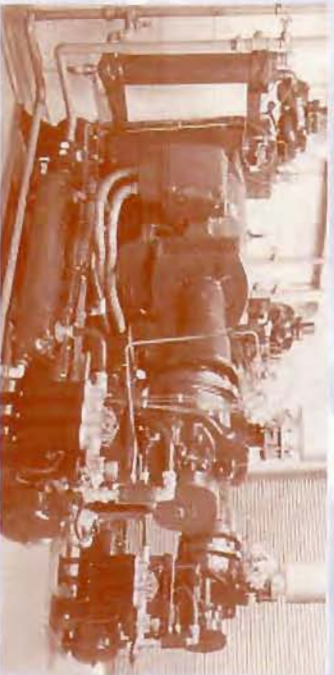
 **CHAMPION**
COMPRESSED AIR & COOLING SOLUTIONS



United Technologies



A Champion History



1971 Turnkey installations of both reciprocating and rotary screw compressors.



1978 A full range of heavy duty compressors.



1987 The Champion 'Ecopack' range.



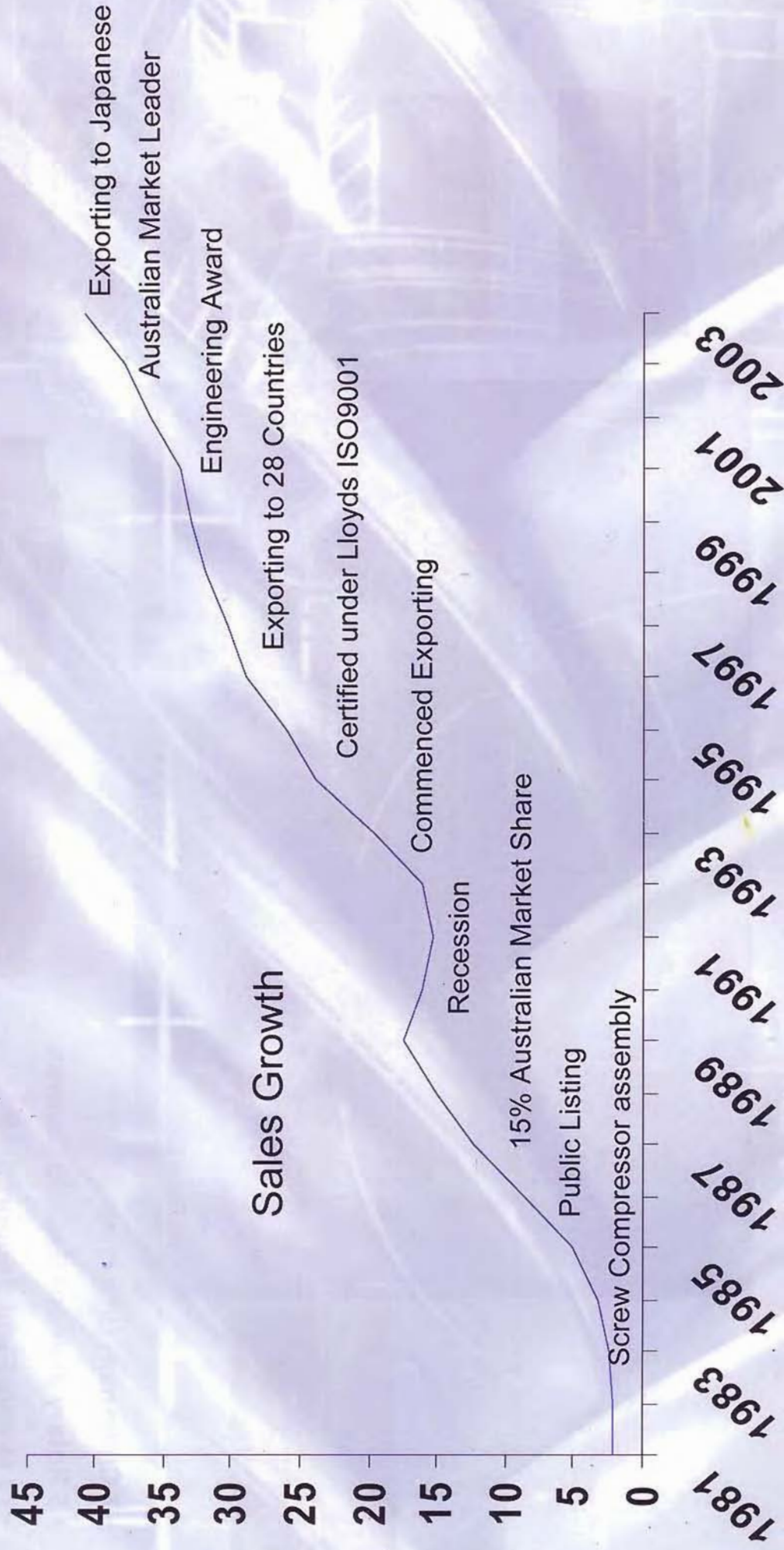
1994 The revised Ecopack range.



2000 Champion Marathon Range

CHAMPION
COMPRESSED AIR & COOLING SOLUTIONS

Champion Growth and Milestones



Champion Branch Network



- 7 Champion Branches
- 5 Rotary element Rebuild Centres
- 73 Mobile Field Support Staff
- 11 Servicing Distributors



Champion Overseas Distributors



Champion exports to countries throughout Asia, Africa and the Middle East and we're moving into South America and Northern Europe.

A Champion Design

A team of design engineers are based at Champion's head office in Melbourne, giving Champion the unique ability to respond to changes in demand and design, and build machines to exact customer specifications.



Lloyd's Quality Assurance

CERTIFICATE OF APPROVAL

This is to certify that the Quality Management System of
Champion Compressors Ltd
 Hallam, Victoria
 Australia

has been approved by Lloyd's Register Quality Assurance
 to the following Quality Management System Standards:
AS/NZS ISO 9001:2000


The Quality Management System is applicable to:
 Design, manufacture, repair and on-site servicing of packaged rotary screw and
 reciprocating compressor systems and associated compressed air equipment.
 Stockholding of associated spares, filters, refrigerated air dryers,
 pneumatic construction tools, Sallaire® portable
 compressors, drill kits and fully encapsulated
 rotary screw compressors.


This certificate is valid only in association with the certificate schedule bearing the same
 number on which the locations applicable to this approval are listed.

Approval Certificate No: MEQ 0931752

Original Approval: 25 July 1995
 Current Certificate: 8 August 2001
 Certificate Expiry: 30 June 2004

Melen Adam
 Issued by: LKQA Melbourne


 8001



This certificate is issued only in accordance with the LQA's accreditation and certification procedures and is limited by LQA's
 Terms and Conditions of Accreditation. It is not to be used for any other purpose. The LQA's accreditation and certification procedures
 are available on the LQA's website. For more information, please contact the LQA's Customer Service Centre on 0800 000 000.
 Further information regarding the scope of this certificate and the applicability of LQA's accreditation may be obtained by contacting the LQA.

Engineering Excellence Award


**ENGINEERING
 Excellence Awards
 1999**

Creating the future





 Engineering
 Excellence
 Awards 1999

Champion Compressors

was awarded a
**Highly Commended
 Award**
 for
CSE Compressor Development

K.W. Mathers
 State Chairman

Tommy Burdiffe
 A. C. Cutcliffe
 Executive Director

ISO 9001:2000

MahManufacturing & All Branches
 COMPRESSED AIR & COOLING SOLUTIONS

Telstra Supplier of the Year Award

Champion was a finalist at the recent Telstra Vendor Awards. It was one of Champion's biggest achievements and honours to be a finalist of the 20,000 suppliers to Telstra. It demonstrates the excellence Champion has attained in both service & product.

Telstra

Vendor

Awards 2002

Finalist

Innovation - Quality

Presented to

Champion
Compressors Pty Ltd

Telstra

**CHAMPION**
COMPRESSED AIR & COOLING SOLUTIONS

Champion's Factory



Purpose built factory in Hallam, Victoria
3880 m² manufacturing facilities



Champion's Factory



Just in time production under an
ISO9001 QMS

CHAMPION
COMPRESSED AIR & COOLING SOLUTIONS

Champion's Factory



CHAMPION
COMPRESSED AIR & COOLING SOLUTIONS

Champion's Products And Services



CHAMPION
COMPRESSED AIR & COOLING SOLUTIONS

Australian Made



Champion Integrated Screw Compressors

Capacity: 6-28l/s
(14-60 cfm)
Pressure: 780-1300 kpa
(115-185 psi)



Champion Rotary Screw Compressors

Capacity: 23-689l/s
(49-1460 cfm)
Pressure: 780-1300 kpa
(115-185 psi)



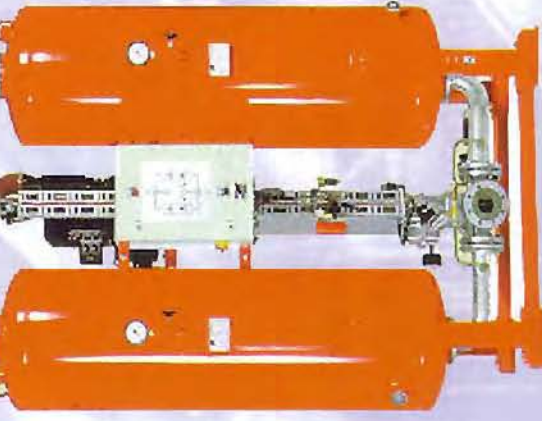
Champion Industrial Reciprocating Compressors

Capacity: 6-27l/s
(13-57 cfm)
Pressure: 1000 kpa
(150 psi)

Clean Air Products

Champion Microfilters

Capacity: 14-8020 l/s
(29-17000 cfm)
Pressure: 100-1600 kpa
(14-230 psi)



Champion Adsorption Dryers

Dryers

Capacity: 2-1560 l/s
(4-3300 cfm)
Pressure: 400-1600 kpa
(57-230 psi)



Champion

Refrigerated Dryers

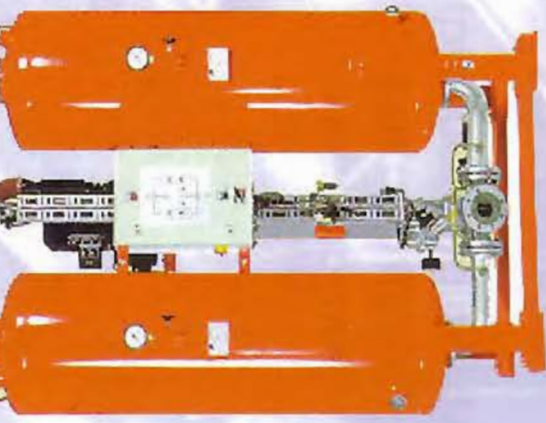
Capacity: 9-3400 l/s
(20-7200 cfm)
Pressure: 400-1600 kpa
(57-230 psi)

Clean Air Products

Champion Microfilters

Capacity: 14-8020 l/s
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Pressure: 100-1600 kpa
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Pressure: 400-1600 kpa
(57-230 psi)



Champion Refrigerated Dryers

Capacity: 9-3400 l/s
(20-7200 cfm)

Pressure: 400-1600 kpa
(57-230 psi)

CHAMPION
COMPRESSED AIR & COOLING SOLUTIONS

Ancillaries



- Aftercoolers
- Automatic Drains
- Oil/Water Separators
- Receivers
- Accessories
- Turnkey Installations



CHAMPION
COMPRESSED AIR & COOLING SOLUTIONS

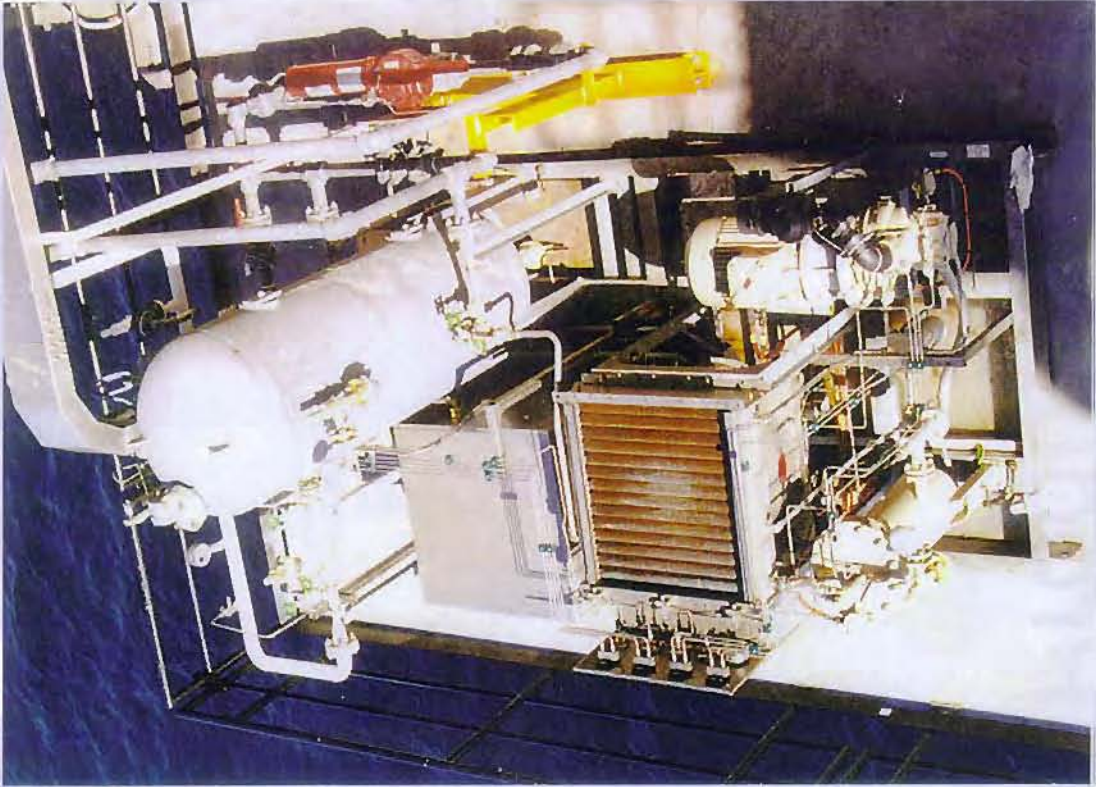


Engineered Products



CHAMPION
COMPRESSED AIR & COOLING SOLUTIONS

Engineered Products



CHAMPION
COMPRESSED AIR & COOLING SOLUTIONS

Engineered Products



CHAMPION

COMPRESSED AIR & COOLING SOLUTIONS



**CHAMPION
CHILLERS**

**CHAMPION
GENUINE PARTS**

**CHAMPION
REFRIGERATED DRYER**

Tomago – F87



- 45kW Comp.
- Mono-clone filter & large capacity cooling fan
- Refrigerated dryer

DOSEC – F08

Coal Train's



- Sullair ES8-15HH
- 316S/S cabinet
- IP66 control cubicle

ABB Pelican Point Power Station – G04

Skid Mounted Arrangement (Instrument & Plant Air Supply)



- 2 x CSD55
- 2 x KEN800
- 2 x Dia.914 x 3000 air receivers

CHAMPION
COMPRESSED AIR & COOLING SOLUTIONS

Kvaerner BHP Pakistan – H21

Skid Mounted arrangement (Instrument & Plant Air Supply)



- 2 x CSE37
- 2 x KEN400
- Marshalling cubicle

Santos Moomba – (G39)

Skid Mounted Arrangement (Instrument Air Supply)



- KEN6000 Zander Dryer
- DMN200A MTA Dryer
- F30 Filters
- Skid with Sun Shade

QAL -- (I28)

CSE45 with Anodized Aluminum
Coolers for corrosive
environment protection

Champion can provide Anodized
Aluminum Cooler option from
CSF11 to CSE45

Tanabe Hull 823 – TSX110 (129)

Bulk Handling System Compressor



- Water cooled CSX110
- ABS approved Separator Vessel (American Bureau of Shipping)
- Soft Starter starting
- Water cooled heat exchangers are designed for sea water cooling
- Fully integrated GW14 moisture separator
- Soft Starter with “Line & By-Pass” contactor

CHAMPION
COMPRESSED AIR & COOLING SOLUTIONS

Tumbarumba Grape – I36

- CSF30 Soft Start Comp
- From order to dispatch – 10 workdays!
- Brand of Soft Starter



Chevron Niugini – 137

Skid Mounted arrangement (Instrument & Plant Air Supply)



- 3 x CSF30
- CRD060 Hiross Dryers Skid
- Filters Skid (with by-pass)

Tanabe DNV – I44

Bulk Handling System Compressor



- Water cooled CSX1110
- DNV approved Separator Vessel (Det Norske Veritas)
- Soft Starter starting
- ABB Drive motor with DNV certificate

Moura Mine – I72

- CSD75 with External IP66 cubicle
- Champion’s “QLD Mine Site Elec.” option fitted



Moura Mine – 172

- CSD75 with External IP66 cubicle
- Champion's "QLD Mine Site Elec." option fitted



Apache Energy – 177

Skid Mounted Arrangement (Instrument Air Supply)



- CSD & KEN1400 Skid

Tanabe Keppel Fels – 152

Service & Plant Air System Compressors



- 3 x TSX110
- 3 x TSX132
- Sea Water Cooled
- Full acoustic cabinet



- ABB Star-Delta Starter
- ABB Drive Motor

CHAMPION
COMPRESSED AIR & COOLING SOLUTIONS

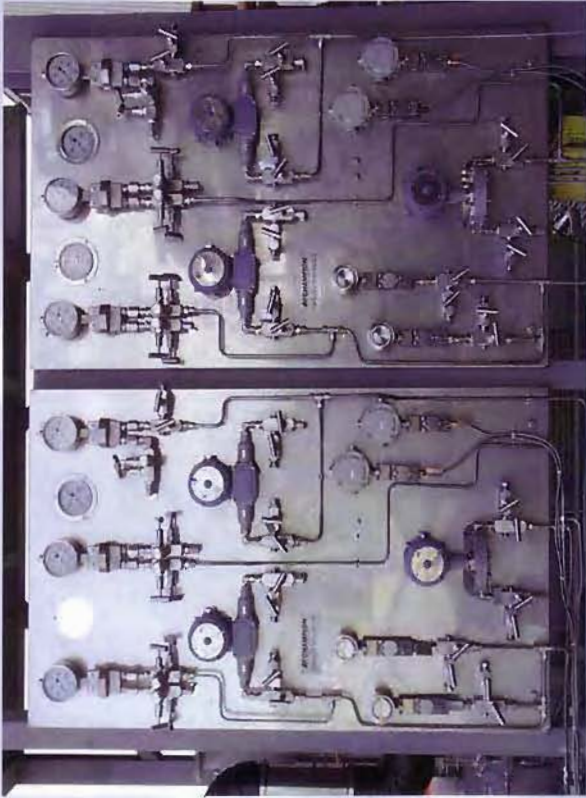
Esso Marlin Platform – J11

(Instrument Air Supply)



- PSX75 (75kW) Compressor
- Design for Hazard Environment “Class 1 Zone 1”
- Toshiba Ex’d’ Drive Motor

Esso Marlin (J11 – Cont.)



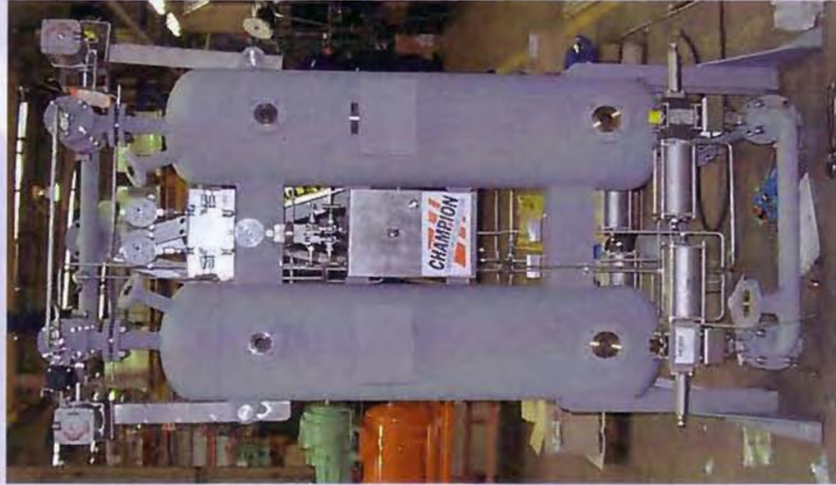
316S/S Components

- Pressure Gauges & Switches
- Block & Bleed arrangement for all pressure control devices
- Tubing & fittings



- Direct coupled arrangement with “Non-Spark” Hazard environment coupling

Esso Marlin (J11 – Cont.)



- Champion / Zander KEN1400 Desiccant Dryer
- Pneumatic control



- API 661 Air Cooled Heat Exchangers

Esso Marlin (J11 – Cont.)



- KEN Dryer Installation at ESSO Marlin Offshore Platform

- API661 ACHE Installation at ESSO Marlin Offshore Platform



CHAMPION
COMPRESSED AIR & COOLING SOLUTIONS

QLD Rail – J48

(Brakes & Utilities Air Supply)



- Ci55 with cyclone pack filter
- Special rail car support frame



Nylex – J83

(Utilities Air Supply)



- Open Frame
VOC160
- Water Cooled

Tanabe Singmarine – J86

(Bulk Material Handling)



- Water cooled
75kW screw
comp

Kvaerner BHPP N2 – K44

(Instrument / Service Air & Nitrogen Generator)



- 2 x CSE45 (De-rated for 50C operation)
- 2 x KEN800
- 1 x N2 Generator

Kvaerner Santos Ballera – K29

(Instrument Air System)



- 1 x CSE37 (with 24VDC control & 316S/S control tubing)
- 1 x KEN400
- 1 x 450L wet air A/R
- Skid mounted with sun shade

Clough Sawan Gas – K29

(Instrument Air System)



- **3 x GSX160** (with IP66 S/S control cubicle, 316S/S control tubing, high filtration filter mats and active louver)
- **1 x KEN3100's Skid with F19 Filters**

- **Active louver exhaust cooling air hood & high filtration inlet pre-filter mats designed for dusty desert environments**

CHAMPION
COMPRESSED AIR & COOLING SOLUTIONS

(Clough Sawan – Cont.)

Suitability for Hazardous environments operation

- 316S/S control tubing with Ex'me' solenoid control valves
- Direct coupled / Gear driven arrangement



(Clough Sawan – Cont.)

- 2 x KEN3100 dryers
- 4 x F19 filters
- Central incoming power cubicle



CHAMPION
COMPRESSED AIR & COOLING SOLUTIONS

Thiess Hail Creek Coal – K14

(Plant & Instrument Air System)



- **CSD55** (with Toshiba 55kW drive motor & IP66 S/S control cubicle)



CHAMPION
COMPRESSED AIR & COOLING SOLUTIONS

Thiess QAL Calciner – K66

(Process & Instrument Air Systems)

- 2 x VOC160 (with IP66 S/S control cubicle, Toshiba drive & fan motor, customer specific paint & electric.)
- 2 x CRD270 Dryers (with customer specific paint)



CHAMPION
COMPRESSED AIR & COOLING SOLUTIONS

Minproc Mt. Garnet Zinc – K97

(Process & Instrument Air System)

- 2 x CSD75 (with W/Proofing)
- 1 x CRD009 Dryer (with W/Proof hood)



CHAMPION
COMPRESSED AIR & COOLING SOLUTIONS

Clough Dalrymple Bay – J32

(Plant Air System)



CSF11 Compressor:

- Toshiba motor
- 304S/S panels
- IP66 S/S control cubicle

Tiwest – K78

(Process Air System)

- 2 x VOC250 @10bar (with 3.3kV Toshiba drive motor)



CHAMPION
COMPRESSED AIR & COOLING SOLUTIONS

BRW – Gladstone Power Station – K61

(Plant & Process Air Systems)



On-Site Eq. -

- 4 x VOC250 Comp's
- 4 x CRD900 dryers
- On-Site equipments were fitted with pressure, temperature and diff. pressure transmitters as part of plant monitoring

Off-Site Eq, -

- 2 x CSD75 Comp's
- 2 x CRD270 dryers

Chevron Texaco – L94

(Process Air Skid)



- 2 x CSF22
- 304S/S cabinet
- IP66 motor
- Full skid mounted