



## **CPCPPS5001B Design industrial gas systems**

### **Advanced Type B gas systems**

**This unit makes up part of CPC50612 Diploma of Hydraulic Services Design**



### **Quick info:**

**Next upcoming course: Brisbane & Canberra Australia**

**Organisation:** Bizmatrix Pty Ltd

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**Phone:** 1300 588 749

**Email:** [info@bizmatrix.edu.au](mailto:info@bizmatrix.edu.au)

**Website:** [www.bizmatrix.edu.au](http://www.bizmatrix.edu.au)

**RTO No.** 32074

**DET:** 0001318900 / **ABN:** 53 122 030 451

## **CPCPPS5001B Design industrial gas systems Advanced Type B Gas Course in detail:**

This unit CPCPPS5001B Design Industrial Gas Systems is the advanced design level of CPCPGS4023B Type B Gas course, covering advanced Type B gas systems.

### **Course outline**

This unit of competency specifies the outcomes required to design industrial gas systems in compliance with Industrial Equipment Code (IEC) requirements, including the design of valve trains, interlocks, pipework and equipment.

### **Who can do Design Industrial Gas Systems?**

Those who are currently working in the Type B Gas sector, who are Type B gas authorised or Restricted Type B gas licenced and have completed CPCPGS4023B or equivalent. Those employed in the industry that are required to design, complete and submit the following:

- Type B gas submissions
- Required to approve Type B gas submissions
- Work on advanced Type B gas systems
- Create advanced industrial specifications

### **Do I need to have prior knowledge?**

There are no pre-requisites for the unit CPCPPS5001B. It is highly recommended before undertaking this course the participant has:

- Completed CPCPGS4023B Install, Commission and Service Type B Gas Appliances or an equivalent unit.
- And/or has evidence of, or equivalent install, commissioning and servicing of Type B gas appliances
- Has solid knowledge of electrical gas control systems
- Recognition of prior learning (RPL) consideration will be given to participants who may be eligible for it
- Evidence for RPL will be required prior to the commencement of this course.  
*Additional costs may apply for the RPL process.*

### **RPL evidence consists of a minimum of:**

- Set of plans for a range or industrial system
- Specification for an industrial gas system
- Testing and commissioning schedule
- Operation and maintenance manual
- Submission document

## Application of this unit

### Australia Capital Territory

- For holders of the Restricted Type B gas Licence CPCPPS5001B Design Industrial Gas Systems is one of the requirements for an advanced Type B gas license.

### Queensland

- Underpins qualification for approval authority
- Contributes to qualifications, offering advanced knowledge in Type B gas systems.

### All States and Territories

- Contributes to advanced Type B gas qualifications
- Professional development

## What will I get from this program?

**Canberra:** You will be able to update your skills from a service, repairs and maintenance Restricted Licence Type B gas fitter, to a pathway as an Advanced licenced Type B gas fitter. You will be able to complete and submit a submission, install, commission and service Type B gas systems.

This course gives you the opportunity to apply for a full advanced Type B gas licence.

**Queensland:** This unit contributes towards your application in becoming a Type B gas approval authority – to be able to approve Type B submissions.

You will expand from basic Type B gas system, moving into more complex systems, which are not covered in the standard Type B Gas Course.

For example: Additional information in hazardous areas, volatiles in certain applications, full modulation systems, ratio regulators, monitor regulators, complex valve trains with double block and bleed systems, leak detection, monitor regulator, zero regulator and modulating valves.

## The unit may contribute to other qualifications and programs like:

CPC50612 Diploma of Hydraulic Services Design

CPC50412 Diploma of Plumbing and Services

## Job prospects after completing this program?

Upon completion of CPCPPS5001B Design industrial gas systems you are able to work as an approval authority or designer of industrial gas systems.

## Course Duration?

The course is completed over a two (2) month period, commencing with **five (5) day onsite training period**, supported by an E-Learning training system. After training, you will have **two months to complete your portfolio** of work, which will be a project as assigned in the first step. After the two-month period, the student will submit the portfolio in the **final three (3) day training period**.

## Summary of the steps:

- Step-1- Five (5) days face to face delivery – with E-Learning support
- Step-2- Complete a portfolio of works- Project (Within 2 months)
- Step 3- Three (3) days finalisation training face to face

## Unit details

Students will learn about design requirements, cost benefit analysis, statutory requirement, layout of pipework systems, fitting and valves, valve trains, system calculations and materials required, joining methods, pipe fixing, installation requirements, plans, commissioning and operation and maintenance manual.

## Assessment:

- Written assessments and quizzes
- Presentation of a portfolio
- Main Assessment - Written portfolio focused on design component.

All assessments follow Australian Nationally Accredited training criteria.



## Option 1: Brisbane

### CPCPPS5001B Design industrial gas systems

The course is designed with a

- Step-1- Five (5) day face to face delivery with E-Learning support
- Step-2- Complete a portfolio of works- Project within 2 months
- Step 3- Three (3) days finalisation training face to face

	Indicative Times	ATBG-1BNE-2016	Brisbane
<b>Step One</b>			
Day 1 Session 1	7:30 AM-1700 PM	Monday 15 <sup>th</sup> February 2016	Brendale
Day 2 Session 2	7:30 AM-1700 PM	Tuesday 16 <sup>th</sup> February 2016	Brendale
Day 3 Session 3	7:30 AM-1700 PM	Wednesday 17 <sup>th</sup> February 2016	Brendale
Day 4 Session 4	7:30 AM-1700 PM	Thursday 18 <sup>th</sup> February 2016	Brendale
Day 5 Session 5	7:30 AM-1700 PM	Friday 19 <sup>th</sup> February 2016	Brendale
<b>Step Two</b>	<b>Project</b>	<b>Review to be advised</b> <b>Due date to be advised</b>	<b>Student Project</b>
<b>Step Three</b>			
Day 1 Session 6	7:30 AM-1700 PM	TBA 2016	Brendale
Day 2 Session 7	7:30 AM-1700 PM	TBA 2016	Brendale
Day 3 Session 8	7:30 AM-1700 PM	TBA 2016	Brendale

## Option 2: Canberra

### CPCPPS5001B Design industrial gas systems

The course is designed with a

- Step-1- Five (5) day face to face delivery with E-Learning support
- Step-2- Complete a portfolio of works- Project within 2 months
- Step 3- Three (3) days finalisation training face to face

	Indicative Times	ATBG-1CNB-2016	Canberra
<b>Step One</b>			
Day 1 Session 1	7:30 AM-1700 PM	To be advised	Canberra
Day 2 Session 2	7:30 AM-1700 PM	To be advised	Canberra
Day 3 Session 3	7:30 AM-1700 PM	To be advised	Canberra
Day 4 Session 4	7:30 AM-1700 PM	To be advised	Canberra
Day 5 Session 5	7:30 AM-1700 PM	To be advised	Canberra
<b>Step Two</b>	<b>Project</b>	<b>Review</b> To be advised <b>Due by</b> To be advised	<b>Student Project</b>
<b>Step Three</b>			
Day 1 Session 6	7:30 AM-1700 PM	To be advised	Canberra
Day 2 Session 7	7:30 AM-1700 PM	To be advised	Canberra
Day 3 Session 8	7:30 AM-1700 PM	To be advised	Canberra



## After you are deemed competent, what's next?

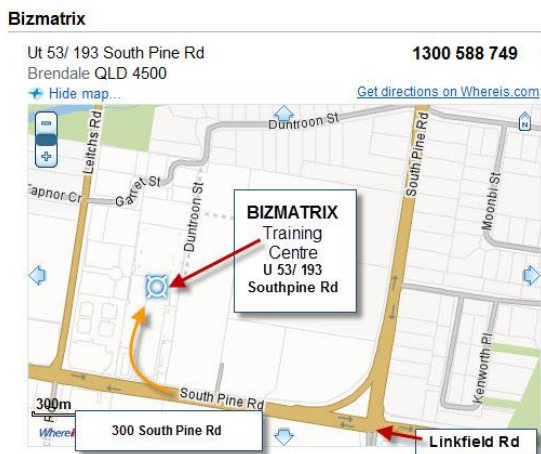
### Successful participants will receive:

- A Statement of Attainment in recognition with and conforming to the AQTF requirements
- Access to technical support and information and our E-Learning resource
- Greater knowledge of Advanced Type B gas appliances and equipment
- Personalised tuition - class sizes restricted to maximum 10-12 people
- Free membership with the Queensland Gas Association Inc ( optional)
- Access to further training and information about the gas industry by becoming a member of the BIZMATRIX VOD Network

## Where are we?

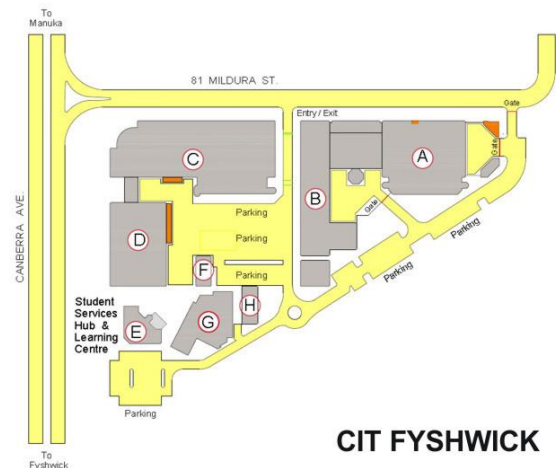
### Brisbane

Unit 53/193 South Pine Road, Brendale



### Canberra

81 Mildura Street, Fyshwick



## What is included in the Bizmatrix Advanced Type B Gas Course?

### Bizmatrix will provide:

- Student – Online resources
- Student manuals and assessments
- Training aids and simulators- If applicable
- Small classes between 8-10 for every trainer
- Trainer support / E-Learner support



## Students to provide, prior to commencing the course:

- The relevant Australian standards as listed or access to these standards
  - AS5601.part 1-2013 Gas Installations
  - AS3814.2015 Industrial and commercial gas appliances
  - AS1596.2014 LPG Storage Systems
- Other applicable standards required throughout the course

\* These standards are available for purchase through Bizmatrix at a reduced rate.

- The student will be required to provide their own device to gain access to the internet, so they may complete the required assignments and designs. A computer with internet is required to access our E-learning portal from home, for the uploading of assessments and to access the online learning resources.

We suggest a laptop with Open source Word and spreadsheet, PDF reader, or Microsoft Office.

- The correct PPE for the practical's
- Pens, pencils, rulers, calculators

## More information

For more information on what we offer take a look at [www.bizmatrix.edu.au](http://www.bizmatrix.edu.au) or training.gov.au RTO 32074 for our full list of scope.

## Contact

**Mailing address:** PO Box 489, Albany Creek, 4035 QLD

**Brisbane Training Centre:** Unit 53/193 South Pine Road, Brendale, QLD 4500

**Phone:** 0457 595 888

**Email:** [info@bizmatrix.edu.au](mailto:info@bizmatrix.edu.au)

## Application form

Option	Units covered	Price	Selection (please tick)
1 – Early bird (if application is sent 20 days prior to course commencing)	CPCPPS5001B Design industrial gas systems	\$4,700 GST free	
3 – Standard price (if registering after early bird cut off)	CPCPPS5001B Design industrial gas systems	\$4,900 GST free	
		TOTAL:	





## REGISTRATION FORM 2016

### Advanced Type B Gas Course Brisbane / Canberra

**ATTENDEE DETAILS** (Please ensure your details are correct, as the information provided will be used for records and or issuing of qualifications)

Title	<input type="text"/>	Birth date	<input type="text"/>	Qualifications	<input type="text"/>
First Name		Middle			
Surname					
Home Address					
State	<input type="text"/>	Suburb	<input type="text"/>	Postcode	<input type="text"/>
Phone Number	<input type="text"/>	Mobile	<input type="text"/>	Fax	<input type="text"/>
Email					
Prime Language if not English	<input type="text"/>	Special Requirements	<input type="text"/>		
Any Special Learning Needs Yes/ No	<input type="text"/>				
Qualifications Completed	CPCPGS4023B YES NO <input type="checkbox"/> Restricted Type B or Other qualified <input type="checkbox"/>				
<i>Please list your Type B qualifications – Date completed:</i>					

**ATBG-1-2015 Advanced Type B Brisbane 1<sup>st</sup> February 2016** ☐

**ATBG-1C-2015 Advanced Type B Canberra TBA** ☐

Course Selection	Standard Course Fees	Early bird discounted fees save up to \$200	Select
	<i>Less than 20 days from Start date</i>	<i>20 days before course date</i>	
CPCPPS5001B Design industrial gas systems	\$4,900 GST Free <input type="checkbox"/>	\$4,700 GST Free <input type="checkbox"/>	

#### PAYMENT DETAILS

(Please tick) Cash ☐ Direct payment ☐ Credit card payment / ☐ BPay ☐

**STUDENT RESPONSIBLE FOR PAYMENT OF FEES (Tick Here)** ☐

**Student responsible for payment no ABN, if payment by company go to Part Two:**

- **Course Fee \$1500 on enrolment balance required by end of Step 1**

**Note:** You will receive two invoices, the registration invoice and a second invoice with the applicable due date. You will not be invoiced more than \$1500 in advance of training. Once the pre-course training has commenced, fees are not refundable – refer to the student handbook for further information.



## Part Two- Payment by company with an ABN

### INVOICE DETAILS for a company or organization

Company Legal Name:		
Address		
State	Suburb	Postcode
Phone Number	Mobile	Fax
Email		
Contact Name	Contact Number	
ABN	PO No	

PAYMENT DETAILS (Please tick) Cash ☐ Direct payment ☐ Credit card payment ☐ / BPay ☐

Course Selection	Standard Course Fees	Early bird discounted fees save up to \$200	Select
	<i>Less than 20 days from Start date</i>	<i>20 days before course date</i>	
CPCPPS5001B Design industrial gas systems	\$4,900 GST Free <input type="checkbox"/>	\$4,700 GST Free <input type="checkbox"/>	

### PAYMENT DETAILS

(Please tick) Cash ☐ Direct payment ☐ Credit card payment / ☐ BPay ☐

STUDENT RESPONSIBLE FOR PAYMENT OF FEES (Tick Here) ☐

**Student responsible for payment no ABN, if payment by company go to Part Two:**

- Course Fee 100% on enrolment

**Once the pre-course training has commenced, fees are not refundable  
– refer to the student handbook for further information.**

- ✓ I confirm I have read the training terms and conditions as published on [www.bizmatrix.edu.au](http://www.bizmatrix.edu.au) and will be attending the sessions as listed. Enclosed are the payment details and my registration details.
- ✓ I understand that I must attend the allocated dates, and charges will apply if I wish to defer and attend other dates, and I may be required to reenroll into the course.
- ✓ I would like you to add my name to the database to be notified of further courses and to be provided with ongoing technical information:
- ✓ I understand the course must be completed within the allocated time period- All portfolios to be submitted by the due date .Failure to submit the information by the due date, may deem me NYC.

<b>Student Name:</b>	<b>EFT details:</b> Westpac Banking BSB 034-272 Account 250-586 or
<b>Signature:</b>	<b>Post to:</b> BIZMATRIX Pty Ltd
<b>Date:</b>	PO BOX 489 ALBANY CREEK Q 4035



## Frequently Asked Questions:

### What are some of the benefits of completing the CPCPPS5001B Design industrial gas systems?

This course is a detailed design component for Type B Industrial gas appliances enabling you to work on more advanced and complex appliances. In the Australian Capital Territory, to receive your full Type B gas license you must complete this unit. However in Queensland and certain states, this unit underpins advanced Type B gas knowledge for existing Type B gas authorised personnel to complete submissions that could be used to apply for an approval authority. This unit also enables you to work on a number of appliances, that are more complex than the appliances covered in the CPCPGS4023B course.

### How long does this course take?

The course is a written course, as the participant is required to evaluate and document design parameters including:

- Client and manufactures requirement
- Legislative and regulatory requirements
- Planning and detailing system components, including:
  - Burners
  - Controls
  - Regulators
- Designing and sizing industrial gas systems
- Preparing plans for a range of industrial gas systems to industry standards
- Preparing specifications for industrial gas systems
- Preparing testing and commissioning schedules
- Producing operation and maintenance manuals.

The course commences with five (5) days of onsite training, where you will be given a design project on one or more Industrial systems.

You will be given two (2) months to complete the full documentation, where you will return to present your portfolio of work created from your evaluations and design parameters.

### What if I can't complete the portfolio submission?

In the first week of training, we will get you on the right track, with our Voyage of Discovery™ document. Next, over the two-month period, regular reviews of your work will be in place, to ensure you are on the right track.

Bizmatrix training is based on real world scenarios and set up, and this project mirrors that, if you fail to submit the work on time, and you will be deemed *Not Competent*. However, if you follow our system, we will assist you through to competency.



### **Why should I do this course?**

During the course, we will be covering the many changes in regulations and the latest changes with equipment and systems. All standards we have listed are current and AS3814-2015 has just come into action from May 2015.

We are contact with the technical regulator, and the Advanced Type B will contribute to keeping your Type B gas knowledge current and inline with ongoing changes.

This training and up skilling will allow you to progress into specialist areas and to increase your quality of work and income. Recent statistics have proven that with correct training– your income can increase up to 12% per annum.

It is important to remember that training and professional development is an investment in your future, keeping you compliant and employed.