

## Safe operation of small scale wood fuelled heat plant

7<sup>th</sup> October 2015, Papanui High School, Christchurch

8<sup>th</sup> October 2015, Childcare Centre, University of Otago, Dunedin

This half day course is principally for the operators of school, municipal swimming pool and rest-home scale heat plant. The course is aimed at school caretakers and facility maintenance staff who are required to operate a wood fuelled heating system safely and efficiently.

The number of boilers operating on wood fuel in New Zealand continues to grow, making good use of a sustainable fuel source and reducing emissions to air. Some boilers are new installations while others are conversions to wood from coal. Whether your boiler is a new one or a conversion, the message is the same –

***"an efficient and safe boiler is one that is installed correctly and regularly maintained, burns high quality fuel and is under the control of a competent and trained operator"***

### Operator certification

Schools and other operators of heat plant often have health and safety plans which require a demonstration of competence for operators of facility equipment. The Bioenergy Association in association with the Waiariki Institute of Technology has therefore established a scheme for certification of trained wood fuelled heat plant operators that schools and facility owners can utilise.

The Association recommends that heat plant operators undergo training both by installers of a new boiler, or by the company carrying out a conversion, and also that they undertake an independent industry training course.

Safety is a key issue when considering boiler operation. While boiler accidents do occur, they are largely uncommon. In many cases, heat plant operators have not been adequately trained or are unfamiliar with the technology and or the fuel. It is especially important that if you change fuel, your operator receives training. Wood chips and pellets behave quite differently from coal for example. It is important that new operators are trained and that those who have been doing the job for many years undergo refresher training at least every two years.



## Short course programme

**8 October 2015**  
**Childcare Centre, University of Otago, Dunedin**

<b>9.00 -9.10.</b>	<b>Welcome and Introduction</b>		
<b>9.10 – 9.30</b>	<b>Introduction to wood energy sector and market. Wood fuel classification</b>		
<b>9.30 – 9.50</b>	<b>Introduction to heat plant and types of heat plant.</b>		
<b>9.50 – 10.10</b>	<b>Combustion characteristics of wood fuel</b>		
<b>10.10 – 10.40</b>	Tea Break	Sponsored by	Pioneer Generation
<b>10.40 – 11 00</b>	<b>The secrets of good heat plant operation</b>		
<b>11.00 –11.20</b>	<b>Fuel management</b>		
<b>11.20 – 11.40</b>	<b>Safety</b>		
<b>11.40– 12.30</b>	<b>Visit to Child Care Centre boiler</b>		
<b>12.30– 1.00</b>	<b>Interpreting what you see in your heat plant</b>		
<b>1.00 – 2.00</b>	Lunch	Sponsored by	Azwood
<b>2.00 – 2.20</b>	<b>Performance optimization</b>		
<b>2.20 – 2.40</b>	<b>Basic heat plant maintenance</b>		
<b>2.40 – 3.00</b>	<b>Monitoring and problem solving</b>		
<b>3.00 – 3.30</b>	Tea break.....	Sponsored by	Natures Flame
<b>3.30 –4.00</b>	<b>Student Assessment (JG)</b>		

Book your place at these short courses

- **Early bird** registrations until 25th September \$180 (incl GST),
- After 25th September \$225 (incl GST)

Registration Forms at: <http://www.bioenergy.org.nz/events>

Heat plant operators who attend the Bioenergy Association training courses will be issued with a Technical Guide on "Safe operation of small scale heat plant" and a laminated certificate that can be affixed to the boiler room wall which certifies that they have attended the training course. The certificate is personal to the trained operators so schools are encouraged to get replacement operators trained when necessary.

At each course, attendees will also be provided with a Guidance Document for Boiler Operators.

[Note: operators of coal plant are welcome to attend as much of the course is also relevant to operating coal plant.]

The training course is supported by



Peter Kernohan Solutions Ltd



**Continuing Professional Development: - The Bioenergy Association supports members by providing opportunities such as this workshop that contribute towards Continuing Professional Development credits and maintaining registration as a wood energy adviser.**

Contact the Executive Officer for more details at [executive@bioenergy.org.nz](mailto:executive@bioenergy.org.nz)

## Venues

7 October 2015

Papanui High School  
30 Langdons Road  
Papanui  
Christchurch City

8 October 2015

Te Pa Childcare Centre,  
University of Otago,  
551 Castle Street North  
Dunedin