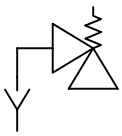
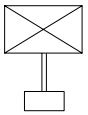
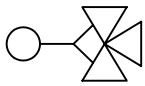
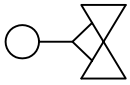
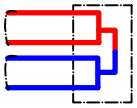
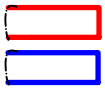
MAINE ECO PELLET HEATING LLC

Connecting Diagrams

Cascade-Systems

Identifying symbols:

	Safety valve		Shut–off valve
	Low water cut off		Non– return valve
	Expansion tank		Mixer with motor
	Manometer		Heating pump (Circulator)
	Thermometer		Regulating valve
	Zone–valve		Distributor without differential pressure
	Customer generally		Distributor with differential pressure

Type of cable:

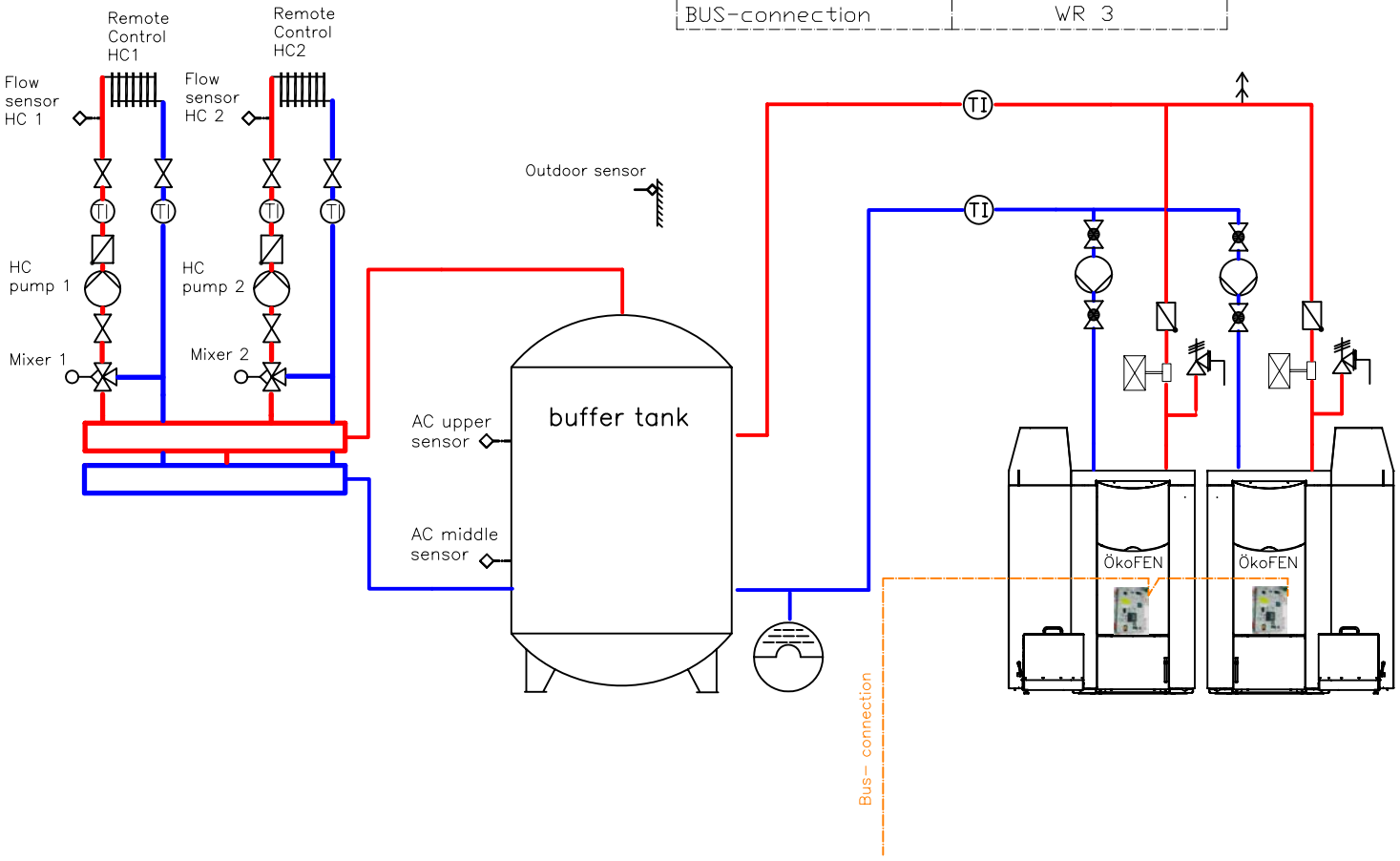
For wiring use the named type of cables or equivalent country specific type of cables.

Connecting diagram –Cascade 1

2 Boiler Pellematic
1 buffer tank

Terminal Box		
Device	Connecting terminal	
Booster pump	Boiler controlled pump	max. 5 Amp.
Low water cut off	Low water cut off	

Boiler Control Unit	
Device	Connecting terminal
BUS-connection	WR 3



Heating–Controller Pelletronic–Plus I/O Box			
Device	Connecting terminal	Type of cable	Cable specification
AC middle sensor	I 8	YML 2X0,75	K 17
AC upper sensor	I 7	YML 2X0,75	K 18
Flow sensor HC 2	I 5	YML 2X0,75	K 11
Flow sensor HC 1	I 4	YML 2X0,75	K 10
Outdoor sensor	I 3	YML 2X0,75	K 09
Remote Control HC 2	I 2	LS–YYCVY–0Z 4X0,75	K 07
Remote Control HC 1	I 1	LS–YYCVY–0Z 4X0,75	K 06
Bus– connection	GND,24V,B,A	LS–YYCVY–0Z 4X0,75	K 01
Network supply	L,N;PE	YML–J 3x1	K 02
HC pump 1	O 1	YML–J 3x0,75	K 14
HC pump 2	O 2	YML–J 3x0,75	K 15
Mixer HC 1 open	O 4	YML–J 3x0,75	K 12
Mixer HC 1 close	O 5		K 12
Mixer HC 2 open	O 6	YML–J 3x0,75	K 13
Mixer HC 2 close	O 7		K 13

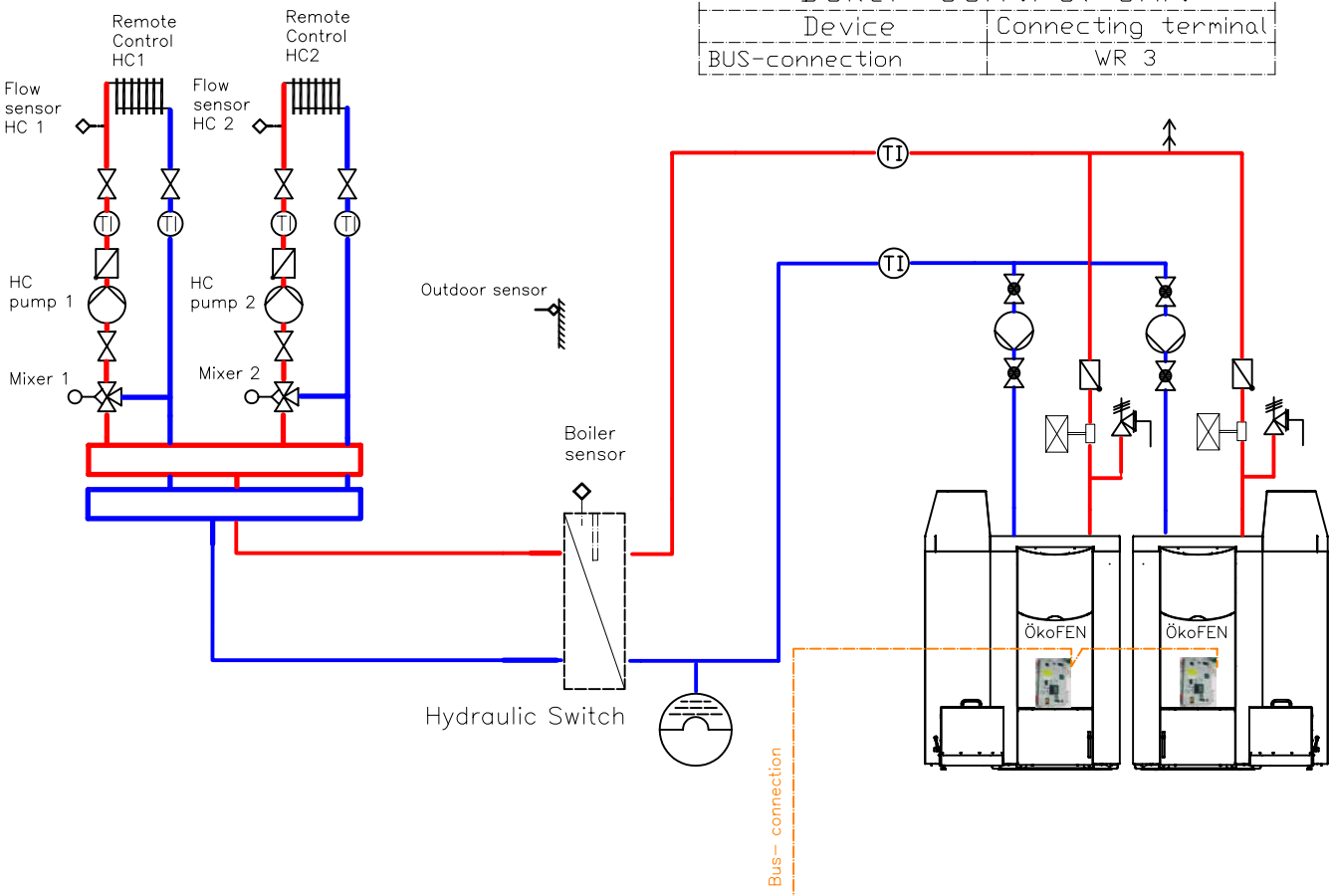
The diagram is symbolic and not exhaustive.

Connecting diagram–Cascade 2

2 Boiler Pellematic
1 Hydraulic Switch

Terminal Box		
Device	Connecting terminal	
Booster pump	Boiler controlled pump	max. 5 Amp.
Low water cut off	Low water cut off	

Boiler Control Unit	
Device	Connecting terminal
BUS-connection	WR 3



Heating–Controller Pelletronic–Plus I/O Box			
Device	Connecting terminal	Type of cable	Cable specification
		YML 2X0,75	K 17
Boiler sensor	I 11	YML 2X0,75	K 18
Flow sensor HC 2	I 5	YML 2X0,75	K 11
Flow sensor HC 1	I 4	YML 2X0,75	K 10
Outdoor sensor	I 3	YML 2X0,75	K 09
Remote Control HC 2	I 2	LS–YYCVY–0Z 4X0,75	K 07
Remote Control HC 1	I 1	LS–YYCVY–0Z 4X0,75	K 06
Bus– connection	GND,24V,B,A	LS–YYCVY–0Z 4X0,75	K 01
Network supply	L,N;PE	YML–J 3x1	K 02
HC pump 1	O 1	YML–J 3x0,75	K 14
HC pump 2	O 2	YML–J 3x0,75	K 15
Mixer HC 1 open	O 4	YML–J 3x0,75	K 12
Mixer HC 1 close	O 5		K 12
Mixer HC 2 open	O 6	YML–J 3x0,75	K 13
Mixer HC 2 close	O 7		K 13

The diagram is symbolic and not exhaustive.

Connecting diagram–Cascade 3

MEco
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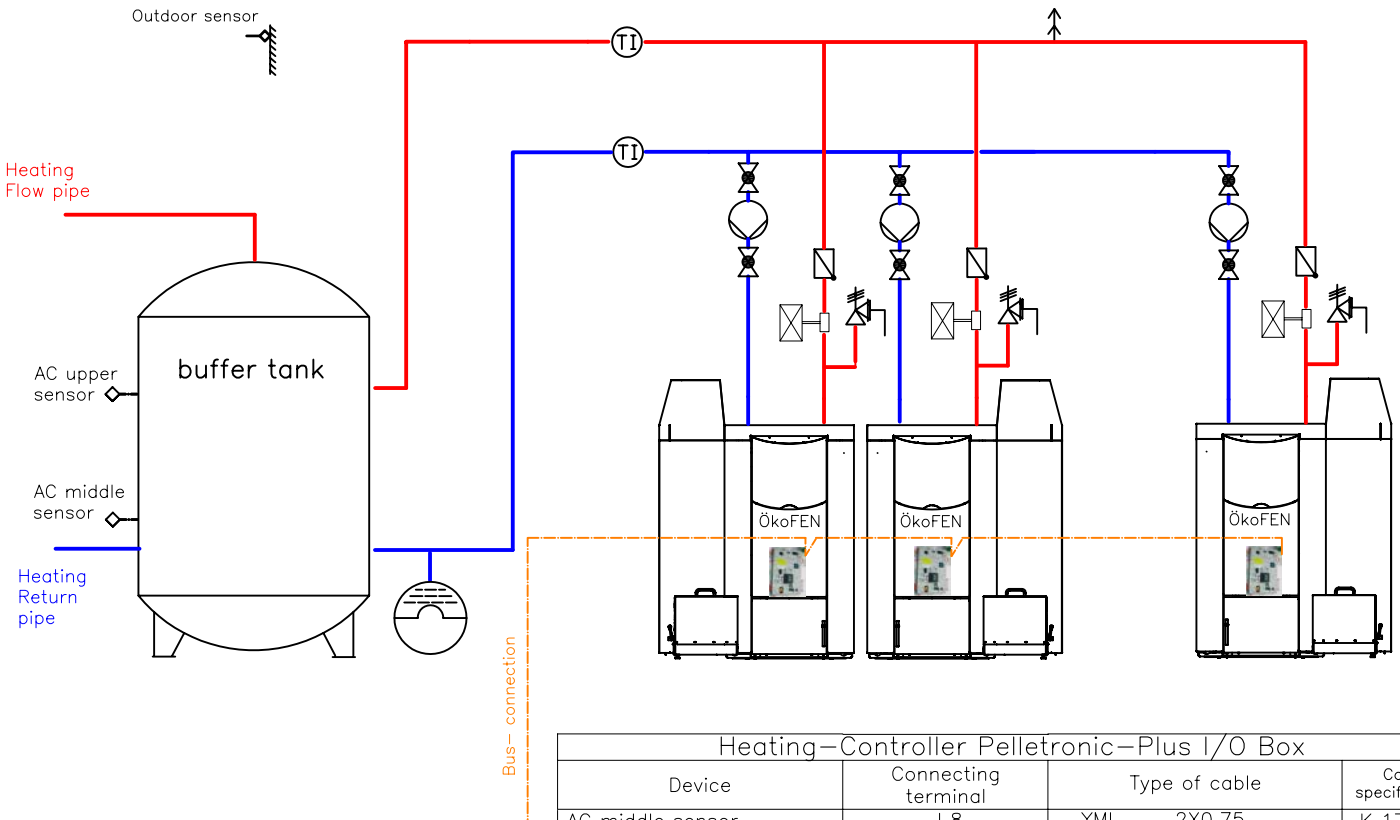
3 Boiler Pellematic
1 buffer tank

Terminal Box		
Device	Connecting terminal	
Booster pump	Boiler controlled pump	max. 5 Amp.
Low water cut off	Low water cut off	

Boiler Control Unit	
Device	Connecting terminal
BUS-connection	WR 3



Heating–Controller Pelletronic–Plus I/O Box			
Device	Connecting terminal	Type of cable	Cable specification
AC middle sensor	I 8	YML 2X0,75	K 17
AC upper sensor	I 7	YML 2X0,75	K 18
Flow sensor HC 2	I 5	YML 2X0,75	K 11
Flow sensor HC 1	I 4	YML 2X0,75	K 10
Outdoor sensor	I 3	YML 2X0,75	K 09
Remote Control HC 2	I 2	LS–YYCVY–0Z 4X0,75	K 07
Remote Control HC 1	I 1	LS–YYCVY–0Z 4X0,75	K 06
Bus– connection	GND,24V,B,A	LS–YYCVY–0Z 4X0,75	K 01
Network supply	L,N;PE	YML–J 3x1	K 02
HC pump 1	O 1	YML–J 3x0,75	K 14
HC pump 2	O 2	YML–J 3x0,75	K 15
Mixer HC 1 open	O 4	YML–J 3x0,75	K 12
Mixer HC 1 close	O 5		K 12
Mixer HC 2 open	O 6	YML–J 3x0,75	K 13
Mixer HC 2 close	O 7		K 13

The diagram is symbolic and not exhaustive.

* Optional

The Heating–Controller enables to control 6 Heating–circuits.

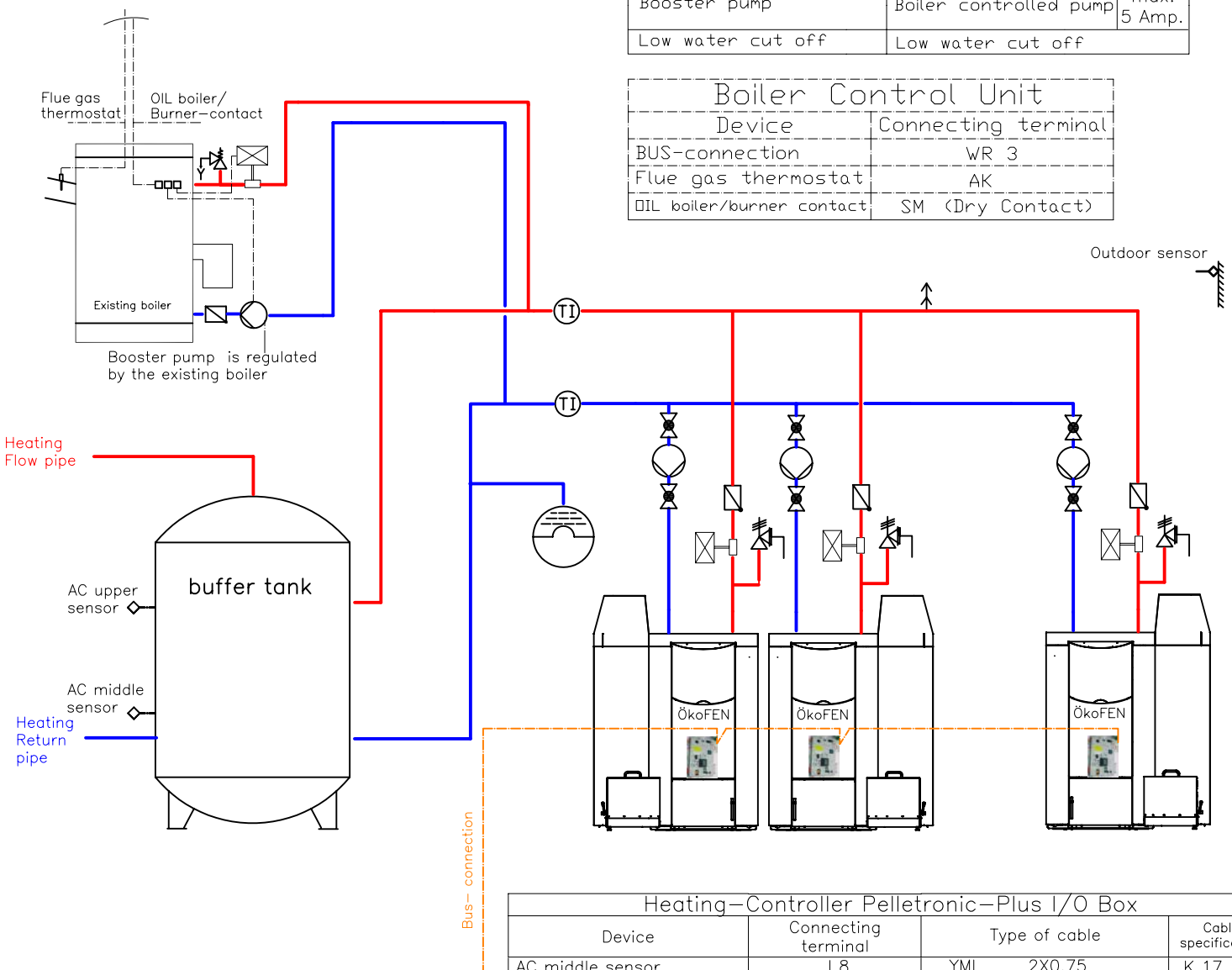
Connecting diagram–Cascade 4

MAINE ECO PELLET HEATING LLC

3 Boiler Pellematic
1 Existing boiler
1 buffer tank

Terminal Box		
Device	Connecting terminal	
Booster pump	Boiler controlled pump	max. 5 Amp.
Low water cut off	Low water cut off	

Boiler Control Unit	
Device	Connecting terminal
BUS-connection	WR 3
Flue gas thermostat	AK
OIL boiler/burner contact	SM (Dry Contact)



Heating–Controller Pelletronic–Plus I/O Box			
Device	Connecting terminal	Type of cable	Cable specification
AC middle sensor	I 8	YML 2X0,75	K 17
AC upper sensor	I 7	YML 2X0,75	K 18
Flow sensor HC 2	I 5	YML 2X0,75	K 11
Flow sensor HC 1	I 4	YML 2X0,75	K 10
Outdoor sensor	I 3	YML 2X0,75	K 09
Remote Control HC 2	I 2	LS–YYCVY–0Z 4X0,75	K 07
Remote Control HC 1	I 1	LS–YYCVY–0Z 4X0,75	K 06
Bus– connection	GND,24V,B,A	LS–YYCVY–0Z 4X0,75	K 01
Network supply	L,N;PE	YML–J 3x1	K 02
HC pump 1	O 1	YML–J 3x0,75	K 14
HC pump 2	O 2	YML–J 3x0,75	K 15
Mixer HC 1 open	O 4	YML–J 3x0,75	K 12
Mixer HC 1 close	O 5		K 12
Mixer HC 2 open	O 6	YML–J 3x0,75	K 13
Mixer HC 2 close	O 7		K 13

The diagram is symbolic and not exhaustive.

* Optional

The Heating–Controller enables to control 6 Heating–circuits.

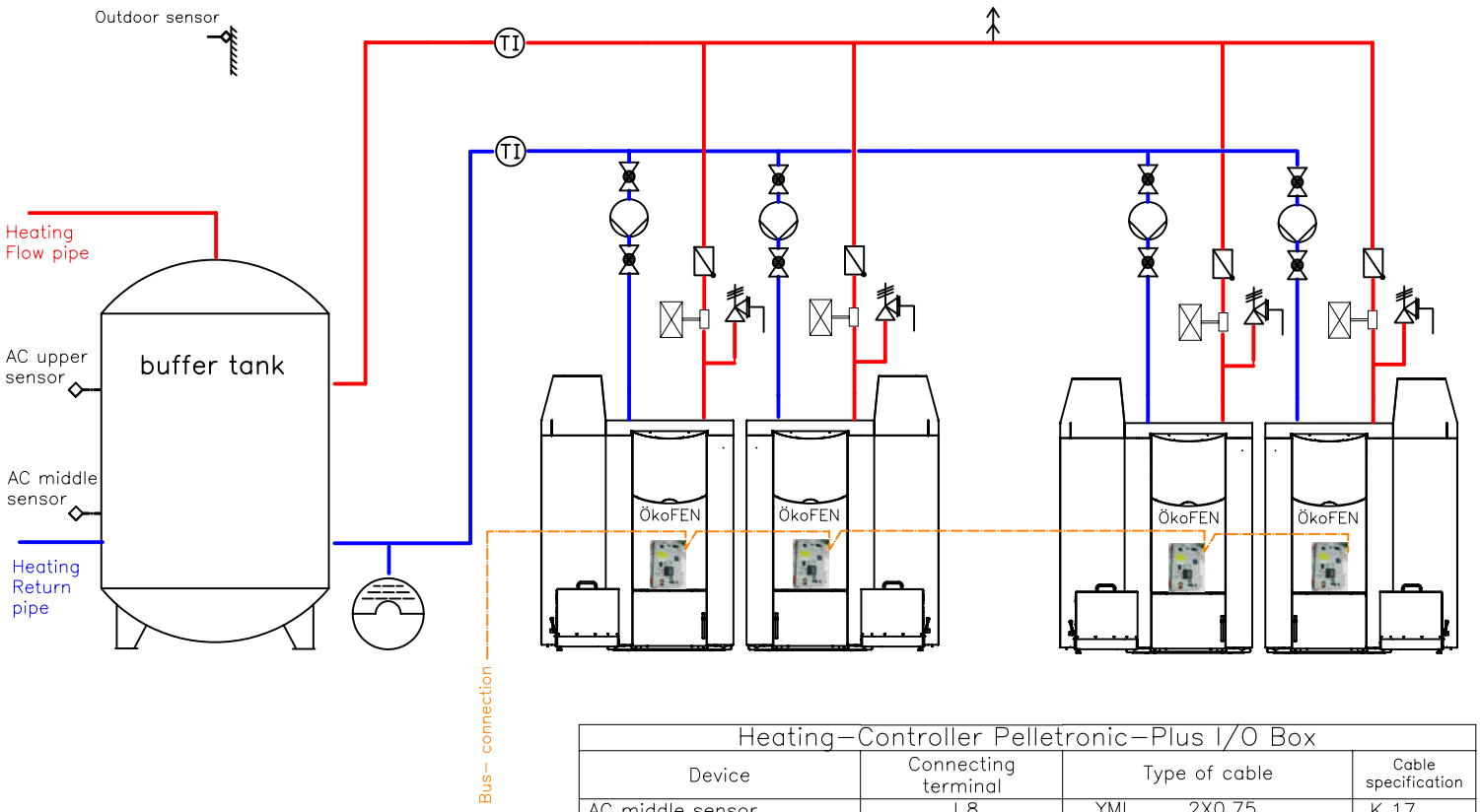
Connecting diagram–Cascade 5

MEco
MAINE ECO PELLET HEATING LLC

4 Boiler Pellematic
1 buffer tank

Terminal Box		
Device	Connecting terminal	
Booster pump	Boiler controlled pump	max. 5 Amp.
Low water cut off	Low water cut off	

Boiler Control Unit	
Device	Connecting terminal
BUS-connection	WR 3



Heating–Controller Pelletronic–Plus I/O Box			
Device	Connecting terminal	Type of cable	Cable specification
AC middle sensor	I 8	YML 2X0,75	K 17
AC upper sensor	I 7	YML 2X0,75	K 18
Flow sensor HC 2	I 5	YML 2X0,75	K 11
Flow sensor HC 1	I 4	YML 2X0,75	K 10
Outdoor sensor	I 3	YML 2X0,75	K 09
Remote Control HC 2	I 2	LS–YYCVY–0Z 4X0,75	K 07
Remote Control HC 1	I 1	LS–YYCVY–0Z 4X0,75	K 06
Bus– connection	GND,24V,B,A	LS–YYCVY–0Z 4X0,75	K 01
Network supply	L,N;PE	YML–J 3x1	K 02
HC pump 1	O 1	YML–J 3x0,75	K 14
HC pump 2	O 2	YML–J 3x0,75	K 15
Mixer HC 1 open	O 4	YML–J 3x0,75	K 12
Mixer HC 1 close	O 5		K 12
Mixer HC 2 open	O 6	YML–J 3x0,75	K 13
Mixer HC 2 close	O 7		K 13

The diagram is symbolic and not exhaustive.

* Optional

The Heating–Controller enables to control 6 Heating–circuits.