

## C1300 Custom Configuration

### 1 Introduction

ABB can supply custom configurations for the C1300 Advanced Circular Chart Recorder on request.

Enter the required setting or place a check mark (✓) against the relevant parameters in the following tables and return this document to the Global Sales office at Stonehouse.

### 2 Channels Configuration

Referring to Section 3.5 of the User Guide (IM/C1300), enter the settings required for each of the channels.

#### 2.1 Channel 1

**Channel Input Type** (✓ the input type required)

None	
Millivolt	
Milliamp	
High Ohm	
Low Ohm	
Volts	
Thermocouple	
Rtd	

**Linearizer Type** (✓ the linearizer type required)

THC Type B	
THC Type E	
THC Type J	
THC Type K	
THC Type N	
THC Type R	
THC Type S	
THC Type T	
RTD (PT100)	
Square root	
3/2	
5/2	

**Channel Units** (enter the units required)

--

**Electrical Input Range** (enter the values required)

High	
Low	

**Decimal Point** (✓ the number of decimal places required)

0	
1	
2	
3	
4	

**Engineering Range** (enter the values required)

High	
Low	

**Pen Range** (enter the values required)

High	
Low	

**Broken Sensor Protection Drive**

(✓ the drive direction required)

Downscale	
None	
Upscale	

**Fault Detection Level %** (enter the tolerance required)

--

**Pen Filter** (enter the filter time required)

--

## 2.2 Channel 2

### Channel Input Type (✓ the input type required)

None	
Millivolt	
Milliamp	
High Ohm	
Low Ohm	
Volts	
Thermocouple	
Rtd	

### Linearizer Type (✓ the linearizer type required)

THC Type B	
THC Type E	
THC Type J	
THC Type K	
THC Type N	
THC Type R	
THC Type S	
THC Type T	
RTD (PT100)	
Square root	
3/2	
5/2	

### Channel Units (enter the units required)

--

### Electrical Input Range (enter the values required)

High	
Low	

### Decimal Point (✓ the number of decimal places required)

0	
1	
2	
3	
4	

### Engineering Range (enter the values required)

High	
Low	

### Pen Range (enter the values required)

High	
Low	

### Broken Sensor Protection Drive

(✓ the drive direction required)

Downscale	
None	
Upscale	

### Fault Detection Level % (enter the tolerance required)

--

### Pen Filter (enter the filter time required)

--

### 2.3 Channel 3

**Channel Input Type** (✓ the input type required)

None	
Millivolt	
Milliamp	
High Ohm	
Low Ohm	
Volts	
Thermocouple	
Rtd	

**Linearizer Type** (✓ the linearizer type required)

THC Type B	
THC Type E	
THC Type J	
THC Type K	
THC Type N	
THC Type R	
THC Type S	
THC Type T	
RTD (PT100)	
Square root	
3/2	
5/2	

**Channel Units** (enter the units required)

--

**Electrical Input Range** (enter the values required)

High	
Low	

**Decimal Point** (✓ the number of decimal places required)

0	
1	
2	
3	
4	

**Engineering Range** (enter the values required)

High	
Low	

**Pen Range** (enter the values required)

High	
Low	

**Broken Sensor Protection Drive**  
 (✓ the drive direction required)

Downscale	
None	
Upscale	

**Fault Detection Level %** (enter the tolerance required)

--

**Pen Filter** (enter the filter time required)

--

## 2.4 Channel 4

**Channel Input Type** (✓ the input type required)

None	
Millivolt	
Milliamp	
High Ohm	
Low Ohm	
Volts	
Thermocouple	
Rtd	

**Linearizer Type** (✓ the linearizer type required)

THC Type B	
THC Type E	
THC Type J	
THC Type K	
THC Type N	
THC Type R	
THC Type S	
THC Type T	
RTD (PT100)	
Square root	
3/2	
5/2	

**Channel Units** (enter the units required)

--

**Electrical Input Range** (enter the values required)

High	
Low	

**Decimal Point** (✓ the number of decimal places required)

0	
1	
2	
3	
4	

**Engineering Range** (enter the values required)

High	
Low	

**Pen Range** (enter the values required)

High	
Low	

**Broken Sensor Protection Drive**

(✓ the drive direction required)

Downscale	
None	
Upscale	

**Fault Detection Level %** (enter the tolerance required)

--

**Pen Filter** (enter the filter time required)

--

**Event Pen Source** – applicable only if pen function set to 'Event' (enter the digital source required)

In	
Out	

### 3 Alarm Configuration

Referring to Section 3.6 of the User Guide (IM/C1300), enter the settings required for each of the alarms.

#### 3.1 Alarm A1

**Type** (✓ the alarm type required)

Off	
High Process	
Low Process	
Fast Rate	
Slow Rate	

**Trip Level** (enter the trip point value required)

**Hysteresis** (enter the hysteresis value required)

**Time Hysteresis**

(enter the time hysteresis value required)

#### 3.2 Alarm B1

**Type** (✓ the alarm type required)

Off	
High Process	
Low Process	
Fast Rate	
Slow Rate	

**Trip Level** (enter the trip point value required)

**Hysteresis** (enter the hysteresis value required)

**Time Hysteresis**

(enter the time hysteresis value required)

#### 3.3 Alarm C1

**Type** (✓ the alarm type required)

Off	
High Process	
Low Process	
Fast Rate	
Slow Rate	

**Trip Level** (enter the trip point value required)

**Hysteresis** (enter the hysteresis value required)

**Time Hysteresis**

(enter the time hysteresis value required)

#### 3.4 Alarm D1

**Type** (✓ the alarm type required)

Off	
High Process	
Low Process	
Fast Rate	
Slow Rate	

**Trip Level** (enter the trip point value required)

**Hysteresis** (enter the hysteresis value required)

**Time Hysteresis**

(enter the time hysteresis value required)

### 3.5 Alarm A2

**Type** (✓ the alarm type required)

Off	
High Process	
Low Process	
Fast Rate	
Slow Rate	

**Trip Level** (enter the trip point value required)

**Hysteresis** (enter the hysteresis value required)

**Time Hysteresis**

(enter the time hysteresis value required)

### 3.6 Alarm B2

**Type** (✓ the alarm type required)

Off	
High Process	
Low Process	
Fast Rate	
Slow Rate	

**Trip Level** (enter the trip point value required)

**Hysteresis** (enter the hysteresis value required)

**Time Hysteresis**

(enter the time hysteresis value required)

### 3.7 Alarm C2

**Type** (✓ the alarm type required)

Off	
High Process	
Low Process	
Fast Rate	
Slow Rate	

**Trip Level** (enter the trip point value required)

**Hysteresis** (enter the hysteresis value required)

**Time Hysteresis**

(enter the time hysteresis value required)

### 3.8 Alarm D2

**Type** (✓ the alarm type required)

Off	
High Process	
Low Process	
Fast Rate	
Slow Rate	

**Trip Level** (enter the trip point value required)

**Hysteresis** (enter the hysteresis value required)

**Time Hysteresis**

(enter the time hysteresis value required)

### 3.9 Alarm A3

Type (✓ the alarm type required)

Off	
High Process	
Low Process	
Fast Rate	
Slow Rate	

**Trip Level** (enter the trip point value required)

**Hysteresis** (enter the hysteresis value required)

**Time Hysteresis**

(enter the time hysteresis value required)

### 3.10 Alarm B3

Type (✓ the alarm type required)

Off	
High Process	
Low Process	
Fast Rate	
Slow Rate	

**Trip Level** (enter the trip point value required)

**Hysteresis** (enter the hysteresis value required)

**Time Hysteresis**

(enter the time hysteresis value required)

### 3.11 Alarm C3

Type (✓ the alarm type required)

Off	
High Process	
Low Process	
Fast Rate	
Slow Rate	

**Trip Level** (enter the trip point value required)

**Hysteresis** (enter the hysteresis value required)

**Time Hysteresis**

(enter the time hysteresis value required)

### 3.12 Alarm D3

Type (✓ the alarm type required)

Off	
High Process	
Low Process	
Fast Rate	
Slow Rate	

**Trip Level** (enter the trip point value required)

**Hysteresis** (enter the hysteresis value required)

**Time Hysteresis**

(enter the time hysteresis value required)

### 3.13 Alarm A4

**Type** (✓ the alarm type required)

Off	
High Process	
Low Process	
Fast Rate	
Slow Rate	

**Trip Level** (enter the trip point value required)

**Hysteresis** (enter the hysteresis value required)

**Time Hysteresis**

(enter the time hysteresis value required)

### 3.14 Alarm B4

**Type** (✓ the alarm type required)

Off	
High Process	
Low Process	
Fast Rate	
Slow Rate	

**Trip Level** (enter the trip point value required)

**Hysteresis** (enter the hysteresis value required)

**Time Hysteresis**

(enter the time hysteresis value required)

### 3.15 Alarm C4

**Type** (✓ the alarm type required)

Off	
High Process	
Low Process	
Fast Rate	
Slow Rate	

**Trip Level** (enter the trip point value required)

**Hysteresis** (enter the hysteresis value required)

**Time Hysteresis**

(enter the time hysteresis value required)

### 3.16 Alarm D4

**Type** (✓ the alarm type required)

Off	
High Process	
Low Process	
Fast Rate	
Slow Rate	

**Trip Level** (enter the trip point value required)

**Hysteresis** (enter the hysteresis value required)

**Time Hysteresis**

(enter the time hysteresis value required)

## 4 Totalizers Configuration

Referring to Section 3.7 of the User Guide (IM/C1300), enter the settings required for each of the totalizers.

### 4.1 Totalizer 1

**Totalizer Source** (enter the source required)

**Totalizer Tag** (enter the tag required)

**Totalizer Count Direction** (✓ the count direction required)

Up	
Down	

**Totalizer Units** (enter the units required)

**Totalizer Cut Off Value** (enter the value required)

**Totalizer Preset Value** (enter the value required)

**Totalizer Predetermined Value** (enter the value required)

**Totalizer Wrap** (✓ the setting required)

Yes	
No	

**Totalizer Reset Source** (enter the source required)

**Totalizer Reset Day** (✓ the setting required)

**Note.** Applicable only if 'Reset Source' required to be 'Timed'

Monday	
Tuesday	
Wednesday	
Thursday	
Friday	
Saturday	
Sunday	
Mon-Fri	
All	
1st of Month	

**Totalizer Reset Time** (enter the time required)

**Note.** Applicable only if 'Reset Source' required to be 'Timed'

**Totalizer Run Source** (enter the source required)

**Totalizer Log Enable Source** (✓ the setting required)

None	
Prior to reset	
12 hours	
24 hours	

**Totalizer Log Start Time** (enter the time required)

**Note.** Applicable only if 'Log Enable Source' required to be '12 hours' or '24 hours'

## 4.2 Totalizer 2

**Totalizer Source** (enter the source required)

**Totalizer Tag** (enter the tag required)

**Totalizer Count Direction** (✓ the count direction required)

Up	<input type="checkbox"/>
Down	<input type="checkbox"/>

**Totalizer Units** (enter the units required)

**Totalizer Cut Off Value** (enter the value required)

**Totalizer Preset Value** (enter the value required)

**Totalizer Predetermined Value** (enter the value required)

**Totalizer Wrap** (✓ the setting required)

Yes	<input type="checkbox"/>
No	<input type="checkbox"/>

**Totalizer Reset Source** (enter the source required)

**Totalizer Reset Day** (✓ the setting required)

**Note.** Applicable only if 'Reset Source' required to be 'Timed'

Monday	<input type="checkbox"/>
Tuesday	<input type="checkbox"/>
Wednesday	<input type="checkbox"/>
Thursday	<input type="checkbox"/>
Friday	<input type="checkbox"/>
Saturday	<input type="checkbox"/>
Sunday	<input type="checkbox"/>
Mon-Fri	<input type="checkbox"/>
All	<input type="checkbox"/>
1st of Month	<input type="checkbox"/>

**Totalizer Reset Time** (enter the time required)

**Note.** Applicable only if 'Reset Source' required to be 'Timed'

**Totalizer Run Source** (enter the source required)

**Totalizer Log Enable Source** (✓ the setting required)

None	<input type="checkbox"/>
Prior to reset	<input type="checkbox"/>
12 hours	<input type="checkbox"/>
24 hours	<input type="checkbox"/>

**Totalizer Log Start Time** (enter the time required)

**Note.** Applicable only if 'Log Enable Source' required to be '12 hours' or '24 hours'

### 4.3 Totalizer 3

**Totalizer Source** (enter the source required)

**Totalizer Tag** (enter the tag required)

**Totalizer Count Direction** (✓ the count direction required)

Up	<input type="text"/>
Down	<input type="text"/>

**Totalizer Units** (enter the units required)

**Totalizer Cut Off Value** (enter the value required)

**Totalizer Preset Value** (enter the value required)

**Totalizer Predetermined Value** (enter the value required)

**Totalizer Wrap** (✓ the setting required)

Yes	<input type="text"/>
No	<input type="text"/>

**Totalizer Reset Source** (enter the source required)

**Totalizer Reset Day** (✓ the setting required)

**Note.** Applicable only if 'Reset Source' required to be 'Timed'

Monday	<input type="text"/>
Tuesday	<input type="text"/>
Wednesday	<input type="text"/>
Thursday	<input type="text"/>
Friday	<input type="text"/>
Saturday	<input type="text"/>
Sunday	<input type="text"/>
Mon-Fri	<input type="text"/>
All	<input type="text"/>
1st of Month	<input type="text"/>

**Totalizer Reset Time** (enter the time required)

**Note.** Applicable only if 'Reset Source' required to be 'Timed'

**Totalizer Run Source** (enter the source required)

**Totalizer Log Enable Source** (✓ the setting required)

None	<input type="text"/>
Prior to reset	<input type="text"/>
12 hours	<input type="text"/>
24 hours	<input type="text"/>

**Totalizer Log Start Time** (enter the time required)

**Note.** Applicable only if 'Log Enable Source' required to be '12 hours' or '24 hours'

#### 4.4 Totalizer 4

**Totalizer Source** (enter the source required)

**Totalizer Tag** (enter the tag required)

**Totalizer Count Direction** (✓ the count direction required)

Up	<input type="checkbox"/>
Down	<input type="checkbox"/>

**Totalizer Units** (enter the units required)

**Totalizer Cut Off Value** (enter the value required)

**Totalizer Preset Value** (enter the value required)

**Totalizer Predetermined Value** (enter the value required)

**Totalizer Wrap** (✓ the setting required)

Yes	<input type="checkbox"/>
No	<input type="checkbox"/>

**Totalizer Reset Source** (enter the source required)

**Totalizer Reset Day** (✓ the setting required)

**Note.** Applicable only if 'Reset Source' required to be 'Timed'

Monday	<input type="checkbox"/>
Tuesday	<input type="checkbox"/>
Wednesday	<input type="checkbox"/>
Thursday	<input type="checkbox"/>
Friday	<input type="checkbox"/>
Saturday	<input type="checkbox"/>
Sunday	<input type="checkbox"/>
Mon-Fri	<input type="checkbox"/>
All	<input type="checkbox"/>
1st of Month	<input type="checkbox"/>

**Totalizer Reset Time** (enter the time required)

**Note.** Applicable only if 'Reset Source' required to be 'Timed'

**Totalizer Run Source** (enter the source required)

**Totalizer Log Enable Source** (✓ the setting required)

None	<input type="checkbox"/>
Prior to reset	<input type="checkbox"/>
12 hours	<input type="checkbox"/>
24 hours	<input type="checkbox"/>

**Totalizer Log Start Time** (enter the time required)

**Note.** Applicable only if 'Log Enable Source' required to be '12 hours' or '24 hours'

## 5 Relay Configuration

Referring to Section 3.8 of the User Guide (IM/C1300), enter the settings required for each of the relays.

### Relay 1.1 (Input 1)

(enter the source and ✓ the polarity required)

Source				
Polarity	Positive	<input type="checkbox"/>	Negative	<input type="checkbox"/>

### Relay 2.1 (Input 2)

(enter the source and ✓ the polarity required)

Source				
Polarity	Positive	<input type="checkbox"/>	Negative	<input type="checkbox"/>

### Relay 3.1 (Input 3)

(enter the source and ✓ the polarity required)

Source				
Polarity	Positive	<input type="checkbox"/>	Negative	<input type="checkbox"/>

### Relay 4.1 (Input 4)

(enter the source and ✓ the polarity required)

Source				
Polarity	Positive	<input type="checkbox"/>	Negative	<input type="checkbox"/>

### Relay Module Type 3 in Position 4 (if fitted)

(for each relay, enter the source and ✓ the polarity required)

#### Relay 4.1

Source				
Polarity	Positive	<input type="checkbox"/>	Negative	<input type="checkbox"/>

#### Relay 4.2

Source				
Polarity	Positive	<input type="checkbox"/>	Negative	<input type="checkbox"/>

#### Relay 4.3

Source				
Polarity	Positive	<input type="checkbox"/>	Negative	<input type="checkbox"/>

#### Relay 4.4

Source				
Polarity	Positive	<input type="checkbox"/>	Negative	<input type="checkbox"/>

### Relay Module Type 3 in Position 5 (if fitted)

(for each relay, enter the source and ✓ the polarity required)

#### Relay 5.1

Source				
Polarity	Positive	<input type="checkbox"/>	Negative	<input type="checkbox"/>

#### Relay 5.2

Source				
Polarity	Positive	<input type="checkbox"/>	Negative	<input type="checkbox"/>

#### Relay 5.3

Source				
Polarity	Positive	<input type="checkbox"/>	Negative	<input type="checkbox"/>

#### Relay 5.4

Source				
Polarity	Positive	<input type="checkbox"/>	Negative	<input type="checkbox"/>

## 6 Analog Output Configuration

Referring to Section 3.10 of the User Guide (IM/C1300), enter the settings required for each of the analog outputs.

### 6.1 Analog Output 1

**Analog Output Source** (enter the source required)

--

**Analog Output Engineering Range**

(enter the values required)

High	
Low	

**Analog Output Electrical Range (0 to 20 mA)**

(enter the values required)

High	
Low	

### 6.2 Analog Output 2

**Analog Output Source** (enter the source required)

--

**Analog Output Engineering Range**

(enter the values required)

High	
Low	

**Analog Output Electrical Range (0 to 20 mA)**

(enter the values required)

High	
Low	

### 6.3 Analog Output 3

**Analog Output Source** (enter the source required)

--

**Analog Output Engineering Range**

(enter the values required)

High	
Low	

**Analog Output Electrical Range (0 to 20 mA)**

(enter the values required)

High	
Low	

### 6.4 Analog Output 4

**Analog Output Source** (enter the source required)

--

**Analog Output Engineering Range**

(enter the values required)

High	
Low	

**Analog Output Electrical Range (0 to 20 mA)**

(enter the values required)

High	
Low	

## 7 Data Logging Configuration

Referring to Section 3.12 of the User Guide (IM/C1300), enter the settings required for data logging.

**Sample Rate** (✓ the sample rate required)

1 second		5 seconds		10 seconds	
30 seconds		60 seconds		5 minutes	
10 minutes		30 minutes		1 hour	
6 hours					

**Pre-logging Filter Type** (✓ the rate required)

Instantaneous	
Max./Min.	

**New File Creation** (✓ the creation interval required)

Standard	
On Pen Return	

**Instrument Tag** (enter the tag required)

**Pen 1 Short Tag** (enter the tag required)

**Pen 2 Short Tag** (enter the tag required)

**Pen 3 Short Tag** (enter the tag required)

**Pen 4 Short Tag** (enter the tag required)

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