
**Process diagrams for power plants —
Part 2:
Graphical symbols**

*Schémas de procédés pour centrales électriques —
Partie 2: Symboles graphiques*





COPYRIGHT PROTECTED DOCUMENT

© ISO 2015

All rights reserved. Unless otherwise specified, no part of this publication may be reproduced or utilized otherwise in any form or by any means, electronic or mechanical, including photocopying, or posting on the internet or an intranet, without prior written permission. Permission can be requested from either ISO at the address below or ISO's member body in the country of the requester.

ISO copyright office
Case postale 56 • CH-1211 Geneva 20
Tel. + 41 22 749 01 11
Fax + 41 22 749 09 47
E-mail copyright@iso.org
Web www.iso.org

Published in Switzerland

Contents

	Page
Foreword	vi
Introduction	vii
1 Scope	1
2 Normative references	1
3 Terms and definitions	1
4 Graphical symbols	1
4.1 General.....	1
4.2 Size of graphical symbols.....	1
4.3 Creation of new symbol examples.....	2
4.4 Symbols for large/complex objects.....	2
5 Structuring and representation	2
5.1 Overall structure.....	2
5.2 Registration numbers.....	2
5.3 Representation of graphical symbols in the standard.....	3
5.4 Legend to table representation.....	3
6 Connections and related devices	4
6.1 Fluid connections.....	4
6.1.1 Functional connections.....	4
6.1.2 Connections with indication of process media.....	4
6.1.3 Simplified representation.....	5
6.1.4 Symbols for direction, branching, crossing, etc.....	5
6.1.5 Pipeline joints, couplings, etc.....	6
6.1.6 Accessories for connections.....	6
6.1.7 Pipeline components.....	7
6.1.8 Pipeline insulation, tracing, etc.....	8
6.2 Mechanical connections.....	9
7 Fluid flow control	9
7.1 Valves.....	9
7.1.1 On-off valves.....	9
7.1.2 Non-return valves.....	10
7.1.3 Control valves.....	11
7.1.4 Safety and relief valves.....	12
7.1.5 Special valves.....	13
7.1.6 Supplementary valve symbols.....	13
7.1.7 Specific valve features.....	14
7.2 Dampers.....	14
7.2.1 On-off dampers.....	14
7.2.2 Non-return dampers.....	15
7.2.3 Control dampers.....	15
7.2.4 Safety dampers.....	16
7.3 Safety devices other than valves.....	16
8 Actuators	16
8.1 Manual actuators.....	16
8.2 Mechanical actuators.....	16
8.3 Automatic actuators.....	17
8.4 Supplementary symbols.....	17
9 Fluid transport	18
9.1 Pumps.....	18
9.2 Fans, ventilators, blowers, compressors, etc.....	19
9.3 Vacuum pumps, etc.....	20