
Washer-disinfectors —

Part 4:

**Requirements and tests for washer-
disinfectors employing chemical
disinfection for thermolabile
endoscopes**

Laveurs désinfecteurs —

*Partie 4: Exigences et essais pour les laveurs désinfecteurs destinés à
la désinfection chimique des endoscopes thermolabiles*





COPYRIGHT PROTECTED DOCUMENT

© ISO 2018

All rights reserved. Unless otherwise specified, or required in the context of its implementation, 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
CP 401 • Ch. de Blandonnet 8
CH-1214 Vernier, Geneva
Phone: +41 22 749 01 11
Fax: +41 22 749 09 47
Email: copyright@iso.org
Website: www.iso.org

Published in Switzerland

Contents

	Page
Foreword	vi
Introduction	vii
1 Scope	1
2 Normative references	1
3 Terms and definitions	2
4 Performance requirements	5
4.1 General.....	5
4.2 Systems for leak testing.....	7
4.3 Cleaning.....	9
4.3.1 General.....	9
4.3.2 Flushing.....	9
4.3.3 Washing.....	9
4.3.4 Post-washing rinsing.....	9
4.3.5 Determination of cleaning efficacy.....	10
4.4 Disinfecting.....	10
4.4.1 General.....	10
4.4.2 Efficacy of the disinfectant.....	10
4.4.3 Temperature.....	11
4.4.4 Process monitoring.....	11
4.4.5 Disinfectant use.....	11
4.5 Final rinsing.....	12
4.6 Purging to remove rinse water.....	12
4.7 Drying.....	13
4.8 Self-disinfection.....	13
4.9 Water treatment equipment.....	14
4.9.1 General.....	14
4.9.2 Disinfection of water treatment equipment.....	14
4.9.3 Maintenance of piping.....	15
5 Mechanical and process requirements	15
5.1 Materials – Design, manufacture and construction.....	15
5.2 Device channel irrigation system.....	16
5.2.1 General.....	16
5.2.2 Verification of device channel irrigation by the automatic controller.....	17
5.3 Venting and drainage systems.....	17
5.4 Temperature control.....	17
5.4.1 General.....	17
5.4.2 Temperature control of the washing stage.....	18
5.4.3 Temperature control of the disinfection stage.....	18
5.4.4 WD with a minimum operating temperature for the washing and/or disinfection stage.....	18
5.5 Process chemicals.....	18
5.6 Process verification.....	18
5.7 Dosing systems.....	19
6 Testing for conformity	19
6.1 General.....	19
6.2 Test equipment.....	19
6.2.1 General.....	19
6.2.2 Pressure measurement.....	19
6.2.3 Flow measurement.....	19
6.3 Water used for final rinsing.....	20
6.3.1 Principle.....	20
6.3.2 Material/procedure.....	20