



BSI Standards Publication

Energy management systems — Guidance for the implementation, maintenance and improvement of an ISO 50001 energy management system

National foreword

This British Standard is the UK implementation of [ISO 50004:2020](#). It supersedes [BS ISO 50004:2014](#), which is withdrawn.

The UK participation in its preparation was entrusted to Technical Committee SEM/1, Energy Management.

A list of organizations represented on this committee can be obtained on request to its secretary.

This publication does not purport to include all the necessary provisions of a contract. Users are responsible for its correct application.

© The British Standards Institution 2020
Published by BSI Standards Limited 2020

ISBN 978 0 539 01674 1

ICS 03.100.70; 27.015

Compliance with a British Standard cannot confer immunity from legal obligations.

This British Standard was published under the authority of the Standards Policy and Strategy Committee on 30 June 2020.

Amendments/corrigenda issued since publication

Date	Text affected
------	---------------

INTERNATIONAL STANDARD

ISO
50004

Second edition
2020-06-16

Energy management systems — Guidance for the implementation, maintenance and improvement of an ISO 50001 energy management system

*Systèmes de management de l'énergie — Lignes directrices pour la
mise en oeuvre, la maintenance et l'amélioration d'un système de
management de l'énergie de l'ISO 50001*



Reference number
ISO 50004:2020(E)



COPYRIGHT PROTECTED DOCUMENT

© ISO 2020, Published in Switzerland

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
Ch. de Blandonnet 8 • CP 401
CH-1214 Vernier, Geneva, Switzerland
Tel. +41 22 749 01 11
Fax +41 22 749 09 47
copyright@iso.org
www.iso.org

Contents

Page

Foreword	v
Introduction	vi
1 Scope	1
2 Normative references	1
3 Terms, definitions and abbreviated terms	1
3.1 Terms and definitions	1
3.2 Abbreviated terms	1
4 Context of the organization	2
4.1 Understanding the organization and its context	2
4.2 Understanding the needs and expectations of interested parties	3
4.3 Determining the scope of the energy management system	4
4.4 Energy management system	5
5 Leadership	6
5.1 Leadership and commitment	6
5.2 Energy policy	8
5.3 Organization roles, responsibilities and authorities	8
6 Planning	9
6.1 Actions to address risks and opportunities	9
6.2 Objectives, energy targets and planning to achieve them	10
6.3 Energy review	12
6.3.1 General	12
6.3.2 Analysis of energy use and consumption	12
6.3.3 Identification of SEUs based on the analysis	14
6.3.4 Actions related to SEUs	15
6.3.5 Determination and prioritization of potential opportunities for improving energy performance	15
6.3.6 Estimation of future energy use(s) and energy consumption	17
6.4 Energy performance indicators	17
6.5 Energy baseline	19
6.6 Planning for collection of energy data	20
7 Support	21
7.1 Resources	21
7.2 Competence	22
7.3 Awareness	23
7.4 Communication	24
7.5 Documented information	25
7.5.1 General	25
7.5.2 Creating and updating	26
7.5.3 Control of documented information	26
8 Operation	27
8.1 Operational planning and control	27
8.2 Design	29
8.3 Procurement	30
9 Performance evaluation	31
9.1 Monitoring, measurement, analysis and evaluation of energy performance and the EnMS	31
9.1.1 General	31
9.1.2 Evaluation of compliance with legal requirements and other requirements	32
9.2 Internal audit	33
9.3 Management review	34

10	Improvement	35
10.1	Nonconformity and corrective action	35
10.2	Continual improvement	36
Bibliography		37