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REDLINE VERSION

Larmsystem – System för videoövervakning (VSS) – Del 4: Tillämpningsanvisningar

*Video surveillance systems for use in security applications –
Part 4: Application guidelines*

En så kallad ”Redline version” (RLV) innehåller både standarden som fastställts som SEK-publikation och en ändringsmarkerad IEC-standard. Alla tillägg och borttagningar sedan den tidigare utgåvan av IEC-standardens är markerade med färg. Med en RLV sparar du mycket tid när du ska identifiera och bedöma aktuella ändringar i standarden. SEK Svensk Elstandard kan bara ge ut RLV i de fall den finns tillgänglig från IEC.



IEC 62676-4

Edition 2.0 2025-10

INTERNATIONAL STANDARD

REDLINE VERSION

**Video surveillance systems for use in security applications -
Part 4: Application guidelines**

CONTENTS

FOREWORD	6
INTRODUCTION	7
1 Scope	9
2 Normative references	9
3 Terms, definitions and abbreviated terms	10
3.1 Terms and definitions	10
3.2 Abbreviated terms	20
4 General Planning considerations	21
4.1 General considerations	21
4.2 Security concept	22
4.2.1 General	22
4.2.2 Risk assessment	23
4.2.3 Selection of security grades	24
4.3 Developing the operational requirements	25
4.4 Site survey	25
4.5 Security of the VSCC room	25
4.6 System design including site plan	26
4.7 Developing the test plan	27
4.8 Installation, commissioning and hand over	27
4.9 Documenting the system	27
5 Operational requirements specifications	27
5.1 General	27
5.2 Purpose of the operational requirements	27
5.3 Content of the operational requirements	27
5.3.1 General	27
5.3.2 Basic objective/functionalities	28
5.3.3 Definition of surveillance limitations	28
5.3.4 Definition of the site(s) under surveillance	28
5.3.5 Definition of activity to be captured	28
5.3.6 System/picture performance	28
5.3.7 Period of operation	28
5.3.8 Conditions at the location	29
5.3.9 Resilience	29
5.3.10 Monitoring and image storage	29
5.3.11 Exporting images	29
5.3.12 Routine actions	29
5.3.13 Operational response	29
5.3.14 Operator workload	30
5.3.15 Training	30
5.3.16 Expansions	30
5.3.17 List of any other special factors not covered by the above	30
5.4 System operational criteria	30
5.4.1 General	30
5.4.2 Automation	30
5.4.3 Alarm response	31
5.4.4 System response times	31

6	Technical considerations (equipment selection and performance)	32
6.1	General	32
6.2	Camera equipment	32
6.3	Camera and lens selection criteria	32
6.4	Camera selection	33
6.4.1	General	33
6.4.2	PTZ	33
6.5	Lens and housing selection	34
6.6	Site coverage/numbers of cameras	34
6.7	Field of view – object size	36
6.7	Object sizes and pixel density	36
6.7.1	General	36
6.7.2	Object size definitions and required pixel density in IP VSS	37
6.8	Field of view – Other considerations	40
6.9	Illumination	41
6.10	IP Video equipment	43
6.11	Tamper protection/detection	43
6.11.1	Camera tamper protection/detection	43
6.11.2	System tamper protection/detection	43
6.12	System integration	43
7	Image Video signal presentation	44
7.1	Display types	44
7.2	Resolution	46
8	Transmission	47
8.1	Principles	47
8.1.1	General	47
8.1.2	Selection of IP video performance classes	48
8.1.3	Interoperability	49
8.1.4	Interoperability with voice communication	49
8.2	Wired transmission links	49
8.3	Wireless transmission links	50
8.4	Key considerations for IP based transmission systems	51
9	Video performance characteristics	51
9.1	Image compression	51
9.2	Frame rate	52
9.3	Resolution	52
10	Storage characteristics requirements	53
11	Image storage and export	55
11.1	Format of the compressed video data	55
11.2	Encryption	56
11.3	Basic metadata (time, date, camera identifier)	56
11.4	Multiplexing format	56
11.5	Image enhancements	57
11.6	Image export	57
11.7	Replay of exported images	58
12	VSS VSCC control room configuration	58
12.1	Control rooms or secure viewing area	58
12.2	Number, size and positioning of VSS video displays	58

12.3	Displays and screens mounted on or off the workstation	59
12.4	Recommended display sizes	59
12.5	Number of camera images per operator	59
12.6	Number of work stations	60
12.7	Equipment siting	60
12.8	Backup power supply provision	60
12.9	Operating temperature	61
12.10	Lightning and surge protection	61
13	Defining the test plan	61
13.1	Purpose of the test plan	61
13.2	User acceptance testing/inspection	61
13.3	Technical acceptance testing	61
13.3.1	Imaging chain consistency	61
13.3.2	Image quality	62
14	Summary of the documentation Documentational considerations (pre- installation)	64
14.1	General	64
14.2	Risk assessment	64
14.3	Operational requirements	64
14.4	Design specification	64
14.5	Site plan	64
14.6	Test plan	64
15	System installation and commissioning	64
15.1	Factory acceptance testing	64
15.2	Installation process	65
15.3	User acceptance testing, commissioning and handover	66
15.4	Declaration of conformance to standards	66
16	Final documentation	66
16.1	General	66
16.2	Complete system drawings	67
16.3	System commission (with camera specific audits)	67
16.4	Interface descriptions	67
16.5	Operating logbook VSS	67
16.6	Compliance with legislation (informative for information)	67
17	Maintenance	
17.1	Maintenance service agreements	
17.2	Staff	
17.3	Corrective maintenance	
17.4	Preventive maintenance	
17	Operation of VSS	70
17.1	General	70
17.2	Behaviour in the event of malfunctions	71
17.3	At-site visual check	71
17.4	Deviation of requirements for at-site visual checks and maintenance	72
17.5	Maintenance	72
17.6	Inspection (part of preventive maintenance)	72
17.7	Service checks (part of preventive maintenance)	74
17.8	Repair (corrective maintenance)	74

17.9	Improvement.....	74
Annex A	(informative) Current Video standard formats.....	75
A.1	Current video standard format.....	75
A.2	Pixel densities for recognition of other objects of interest.....	75
Annex B	(normative) Test protocol for VSS target.....	76
B.1	Scope of the test.....	76
B.2	Test prerequisites	76
B.3	Preconditions	76
B.4	Face selection	76
B.5	Live view methodology (faces)	77
B.6	Live view methodology (VRN)	77
B.7	Recorded view methodology (faces)	77
B.8	Recorded view methodology (VRN).....	78
B.9	Motion	78
B.10	Faces: scoring criteria.....	78
B.11	VRN: scoring criteria.....	79
B.12	Heads control sheet (for example only)	81
B.13	VRN control sheet (for example only).....	82
Annex C	(normative) Test method of image quality: Guidance for the use of the video test target	83
Annex D	(informative) Guidelines to specifying VSS parameters and security gradings.....	93
D.1	VSS parameters.....	93
D.2	Suggested building blocks	93
D.3	Security gradings	95
D.4	Security grading by system view:	95
D.5	Security grading by size view:.....	96
D.6	Security grading by application view	96
D.7	Number of frames depending on the object speed in a scene width.....	100
Annex E	(normative) Detection response testing and acceptability criteria	102
E.1	General.....	102
E.2	False and nuisance alarms	102
E.3	Setting the response time	103
E.4	PTZ response time test procedure	103
E.5	Observer cueing and prompting	103
E.6	Detection test locations.....	104
E.7	Target camouflage	104
E.8	Tests with moving targets	104
E.9	Test conditions	104
E.10	Testing a 'live' system.....	105
E.11	Detection test results tables.....	105
Bibliography		106
Figure 1	– Process visualization	22
Figure 2	– Structure of a security concept.....	23
Figure 1	– Recommended minimum sizes for PAL (576i) resolution	23
Figure 3	– HD and UHD screen percentages occupied by various categories.....	39
Figure 4	– Pixel density formula.....	40
Figure 5	– Operation of a VSS	70

Figure B.1 – Heads control sheet	81
Figure B.2 – VRN control sheet example	82
Figure C.1 – A3 test target	83
Figure C.2 – Avoiding optical distortion	84
Figure C.1 – Test charts	88
Figure C.2 – Key to Figure C.1	91
Figure C.3 – Avoiding optical distortion	92
Table 1 – Measures depending on security grades	26
Table 2 – Commonly encountered resolutions (in pixels)	27
Table 3 – Person screen height equivalent for different digital resolutions (in percent)	28
Table 2 – Example of system feedback – PTZ control responding time, performance and operator	32
Table 3 – Group names for test charts	38
Table 4 – Typical lux levels	41
Table 5 – Examples of display technologies	45
Table 6 – Example resolutions	46
Table 7 – Factors affecting the storage capacity required for a video recorder	47
Table 7 – Wireless transmission options	50
Table 8 – Inspection cycles versus security grading	70
Table A.1 – Recommendations for recognition of some “non-human” objects	75
Table B.1 – Example auditor log sheet	79
Table B.2 – Example control room observer log sheet	79
Table B.3 – Example camera audit sheet	79
Table B.4 – Blank auditor log sheet	80
Table B.5 – Blank control room observer log sheet	80
Table B.6 – Blank camera audit sheet	80
Table C.1 – Test targets	83
Table D.1 – Suggested VSS building blocks	93
Table D.2 – Security grading by size view	96
Table D.3 – Security grading by application	96
Table D.4 – Security grading by critical infrastructure	98
Table D.5 – Number of frames depending of object speed – Low pixel density objects	100
Table D.6 – Number of frames depending of object speed - High Pixel Density Objects	101
Table E.1 – Detection test results	105

INTERNATIONAL ELECTROTECHNICAL COMMISSION

**Video surveillance systems for use in security applications -
Part 4: Application guidelines**

FOREWORD

- 1) The International Electrotechnical Commission (IEC) is a worldwide organization for standardization comprising all national electrotechnical committees (IEC National Committees). The object of IEC is to promote international co-operation on all questions concerning standardization in the electrical and electronic fields. To this end and in addition to other activities, IEC publishes International Standards, Technical Specifications, Technical Reports, Publicly Available Specifications (PAS) and Guides (hereafter referred to as "IEC Publication(s)"). Their preparation is entrusted to technical committees; any IEC National Committee interested in the subject dealt with may participate in this preparatory work. International, governmental and non-governmental organizations liaising with the IEC also participate in this preparation. IEC collaborates closely with the International Organization for Standardization (ISO) in accordance with conditions determined by agreement between the two organizations.
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This redline version of the official IEC Standard allows the user to identify the changes made to the previous edition IEC 62676-4:2014. A vertical bar appears in the margin wherever a change has been made. Additions are in green text, deletions are in strikethrough red text.

IEC 62676-4 has been prepared by IEC technical committee 79: Alarm and electronic security systems. It is an International Standard.

This second edition cancels and replaces the first edition published in 2014. This edition constitutes a technical revision.

This edition includes the following significant technical changes with respect to the previous edition:

- a) implementing request for define a security concept (instead of just a risk analysis) (4.2);
- b) selection of security grades (4.2.3);
- c) complete redefinition of pixel densities (6.7) including new test charts (Annex C):
 - upgrade of previous MDORII system with 6 pixel densities (12,5 pixels/meter; 25 pixels/meter; 62,5 pixels/meter ; 125 pixels/meter; 250 pixels/meter; 1 000 pixels/meter) into new O2DCPVS system with 7 pixel densities (20 pixels/meter; 40 pixels/meter; 80 pixels/meter; 125 pixels/meter; 250 pixels/meter; 500 pixels/meter; 1 500 pixels/meter)
- d) operation of VSS (Clause 17);
- e) security grading by size view (Annex D, Table D.2);
- f) security grading by application (Annex D, Table D.3);
- g) security grading by critical infrastructure (Annex D, Table D.4);
- h) tables for number of frames depending on object speed (Annex D, Table D.5 and Table D.6);
- i) general updates of tables in entire document.

The text of this International Standard is based on the following documents:

Draft	Report on voting
79/727/FDIS	79/732/RVD

Full information on the voting for its approval can be found in the report on voting indicated in the above table.

The language used for the development of this International Standard is English

A list of all parts in the IEC 62676 series, published under the general title *Video surveillance systems for use in security applications*, can be found on the IEC website.

This document was drafted in accordance with ISO/IEC Directives, Part 2, and developed in accordance with ISO/IEC Directives, Part 1 and ISO/IEC Directives, IEC Supplement, available at www.iec.ch/members_experts/refdocs. The main document types developed by IEC are described in greater detail at www.iec.ch/publications.

The committee has decided that the contents of this document will remain unchanged until the stability date indicated on the IEC website under webstore.iec.ch in the data related to the specific document. At this date, the document will be

- reconfirmed,
- withdrawn, or
- revised.

INTRODUCTION

~~The IEC Technical Committee 79 in charge of alarm and electronic security systems together with many governmental organisations, test houses and equipment manufacturers has defined a common framework for video surveillance transmission in order to achieve interoperability between products.~~

~~The IEC 62676 series of standards on video surveillance system is divided into 4 independent parts:~~

~~Part 1: System requirements~~

~~Part 2: Video transmission protocols~~

~~Part 3: Analog and digital video interfaces~~

~~Part 4: Application guidelines~~

~~Each part offers its own clauses for the scope, normative references, definitions and requirements.~~

~~The purpose of this part of IEC 62676 is to provide guidance on how to ensure that video surveillance systems (VSS), thus far referred to as closed circuit television (CCTV), meet their functional and performance requirements.~~

~~This part of IEC 62676 will prove useful to those responsible for establishing operational requirements, writing specifications, selecting, installing, commissioning, using and maintaining a VSS.~~

~~VSS, in its simplest form, is a means of providing images from security cameras and recorders for viewing on a display via a transmission system. There is no theoretical limit to the number of cameras and displays which may be used in a VSS installation but in practice will be limited by the efficient combination of control and display equipment and the operator's ability to manage the system.~~

~~The successful operation of a VSS requires the active co-operation of the user in carrying out the recommended procedures.~~

~~Due to the wide range of VSS applications, for example security, safety, public safety, transportation, etc. only the minimum requirements are covered in this part of IEC 62676.~~

1 Scope

This part of IEC 62676 ~~gives recommendations and requirements for the selection~~, describes the planning, design, installation, testing, commissioning, and maintaining ~~and testing~~ of video surveillance systems (VSS) comprising image capture device(s), interconnection(s) and image handling device(s), for use in security applications within private or public spaces.

The objectives of this document are to:

- a) provide a framework to assist ~~customers, installers and users~~ all interested parties in establishing their requirements,
- b) assist specifiers and users in determining the appropriate equipment required for a given application,
- c) provide means of evaluating objectively the performance of the VSS.

2 Normative references

The following documents are referred to in the text in such a way that some or all of their content constitutes requirements of this document. For dated references, only the edition cited applies. For undated references, the latest edition of the referenced document (including any amendments) applies.

IEC 62676-1-1:2013, *Video surveillance systems for use in security applications - Part 1-1: System requirements - General*

IEC 62676-1-2:2013, *Video surveillance systems for use in security applications - Part 1-2: System requirements - Performance requirements for video transmission*

IEC 62676-2 (all parts), *Video surveillance systems for use in security applications - Part 2-X: Video transmission protocols*

IEC 62676-2-1, *Video surveillance systems for use in security applications - Part 2-1: Video transmission protocols - General requirements*

~~IEC 62676-2-2, Video surveillance systems for use in security applications - Part 2-2: Video transmission protocols - IP interoperability implementation based on HTTP and REST services~~

~~IEC 62676-2-3, Video surveillance systems for use in security applications - Part 2-3: Video transmission protocols - IP interoperability implementation based on Web services~~

IEC 62676-3, *Video surveillance systems for use in security applications - Part 3: Analog and digital video interfaces*

IEC 62820-2, *Building intercom systems - Part 2: Requirements for advanced security building intercom systems (ASBIS)*

IEC 62820-3-2, *Building intercom systems - Part 3-2: Application guidelines - Advanced security building intercom systems (ASBIS)*

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Larmsystem – System för videoövervakning (VSS) – Del 4: Tillämpningsanvisningar

*Video surveillance systems for use in security applications –
Part 4: Application guidelines*

Som svensk standard gäller europastandarden EN IEC 62676-4:2025. Den svenska standarden innehåller den officiella engelska språkversionen av EN IEC 62676-4:2025.

Nationellt förord

Europastandarden EN IEC 62676-4:2025

består av:

- **europastandardens ikraftsättningsdokument**, utarbetat inom CENELEC
- **IEC 62676-4, Second edition, 2025 - Video surveillance systems for use in security applications – Part 4: Application guidelines**

utarbetad inom International Electrotechnical Commission, IEC.

Tidigare fastställd svensk standard SS-EN 62676-4, utg 1:2016 med eventuella tillägg, ändringar och rättelser gäller ej fr o m 2028-11-30.

Standarder underlättar utvecklingen och höjer elsäkerheten

Det finns många fördelar med att ha gemensamma tekniska regler för bl a mätning, säkerhet och provning och för utförande, skötsel och dokumentation av elprodukter och elanläggningar.

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Många standarder inom elområdet beskriver tekniska lösningar och metoder som åstadkommer den elsäkerhet som föreskrivs av svenska myndigheter och av EU.

SEK är Sveriges röst i standardiseringsarbetet inom elområdet

SEK Svensk Elstandard svarar för standardiseringen inom elområdet i Sverige och samordnar svensk medverkan i internationell och europeisk standardisering. SEK är en ideell organisation med frivilligt deltagande från svenska myndigheter, företag och organisationer som vill medverka till och påverka utformningen av tekniska regler inom elektrotekniken.

SEK samordnar svenska intressenters medverkan i SEKs tekniska kommittéer och stödjer svenska experters medverkan i internationella och europeiska projekt.

Stora delar av arbetet sker internationellt

Utformningen av standarder sker i allt väsentligt i internationellt och europeiskt samarbete. SEK är svensk nationalkommitté av International Electrotechnical Commission (IEC) och Comité Européen de Normalisation Electrotechnique (CENELEC).

Standardiseringsarbetet inom SEK är organiserat i referensgrupper bestående av ett antal tekniska kommittéer som speglar hur arbetet inom IEC och CENELEC är organiserat.

Arbetet i de tekniska kommittéerna är öppet för alla svenska organisationer, företag, institutioner, myndigheter och statliga verk. Den årliga avgiften för deltagandet och intäkter från försäljning finansierar SEKs standardiseringsverksamhet och medlemsavgift till IEC och CENELEC.

Var med och påverka!

Den som deltar i SEKs tekniska kommittéarbete har möjlighet att påverka framtida standarder och får tidig tillgång till information och dokumentation om utvecklingen inom sitt teknikområde. Arbetet och kontakterna med kollegor, kunder och konkurrenter kan gynnsamt påverka enskilda företags affärsutveckling och bidrar till deltagarnas egen kompetensutveckling.

Du som vill dra nytta av dessa möjligheter är välkommen att kontakta SEKs kansli för mer information.

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English Version

**Video surveillance systems for use in security applications - Part
4: Application guidelines
(IEC 62676-4:2025)**

Systèmes de vidéosurveillance destinés à être utilisés dans
les applications de sécurité - Partie 4: Directives
d'application
(IEC 62676-4:2025)

Videoüberwachungsanlagen für Sicherungsanwendungen -
Teil 4: Anwendungsregeln
(IEC 62676-4:2025)

This European Standard was approved by CENELEC on 2025-11-13. CENELEC members are bound to comply with the CEN/CENELEC Internal Regulations which stipulate the conditions for giving this European Standard the status of a national standard without any alteration.

Up-to-date lists and bibliographical references concerning such national standards may be obtained on application to the CEN-CENELEC Management Centre or to any CENELEC member.

This European Standard exists in three official versions (English, French, German). A version in any other language made by translation under the responsibility of a CENELEC member into its own language and notified to the CEN-CENELEC Management Centre has the same status as the official versions.

CENELEC members are the national electrotechnical committees of Austria, Belgium, Bulgaria, Croatia, Cyprus, the Czech Republic, Denmark, Estonia, Finland, France, Germany, Greece, Hungary, Iceland, Ireland, Italy, Latvia, Lithuania, Luxembourg, Malta, the Netherlands, Norway, Poland, Portugal, Republic of North Macedonia, Romania, Serbia, Slovakia, Slovenia, Spain, Sweden, Switzerland, Türkiye and the United Kingdom.



European Committee for Electrotechnical Standardization
Comité Européen de Normalisation Electrotechnique
Europäisches Komitee für Elektrotechnische Normung

CEN-CENELEC Management Centre: Rue de la Science 23, B-1040 Brussels

European foreword

The text of document 79/727/FDIS, future edition 2 of IEC 62676-4, prepared by TC 79 "Alarm and electronic security systems" was submitted to the IEC-CENELEC parallel vote and approved by CENELEC as EN IEC 62676-4:2025.

The following dates are fixed:

- latest date by which the document has to be implemented at national level by publication of an identical national standard or by endorsement (dop) 2026-11-30
- latest date by which the national standards conflicting with the document have to be withdrawn (dow) 2028-11-30

This document supersedes EN 62676-4:2015 and all of its amendments and corrigenda (if any).

Attention is drawn to the possibility that some of the elements of this document may be the subject of patent rights. CENELEC shall not be held responsible for identifying any or all such patent rights.

Any feedback and questions on this document should be directed to the users' national committee. A complete listing of these bodies can be found on the CENELEC website.

Endorsement notice

The text of the International Standard IEC 62676-4:2025 was approved by CENELEC as a European Standard without any modification.

In the official version, for Bibliography, the following notes have to be added for the standard indicated:

IEC 31010	NOTE	Approved as EN IEC 31010
IEC 62305 (series)	NOTE	Approved as EN IEC 62305 (series)
IEC 62305-3	NOTE	Approved as EN IEC 62305-3
IEC 62305-4	NOTE	Approved as EN IEC 62305-4
IEC 62676-2-11	NOTE	Approved as EN IEC 62676-2-11
IEC 62676-2-31	NOTE	Approved as EN IEC 62676-2-31
IEC 62676-2-32	NOTE	Approved as EN IEC 62676-2-32
IEC 62676-2-33	NOTE	Approved as EN IEC 62676-2-33
IEC 62676-5:2018	NOTE	Approved as EN IEC 62676-5:2018 (not modified)

Annex ZA (normative)

Normative references to international publications with their corresponding European publications

The following documents are referred to in the text in such a way that some or all of their content constitutes requirements of this document. For dated references, only the edition cited applies. For undated references, the latest edition of the referenced document (including any amendments) applies.

NOTE 1 Where an International Publication has been modified by common modifications, indicated by (mod), the relevant EN/HD applies.

NOTE 2 Up-to-date information on the latest versions of the European Standards listed in this annex is available here: www.cenelec.eu.

<u>Publication</u>	<u>Year</u>	<u>Title</u>	<u>EN/HD</u>	<u>Year</u>
IEC 62676-1-1	2013	Video surveillance systems for use in security applications - Part 1-1: System requirements - General	EN 62676-1-1	2014
-	-		+ AC	2014
IEC 62676-1-2	2013	Video surveillance systems for use in security applications - Part 1-2: System requirements - Performance requirements for video transmission	EN 62676-1-2	2014
-	-		+ AC	2015
IEC 62676-2	series	Video surveillance systems for use in security applications - Part 2-1: Video transmission protocols - General requirements	EN 62676-2	series
IEC 62676-2-1	-	Video surveillance systems for use in security applications - Part 2-1: Video transmission protocols - General requirements	EN 62676-2-1	-
IEC 62676-3	-	Video surveillance systems for use in security applications - Part 3: Analog and digital video interfaces	EN 62676-3	-
IEC 62820-2	-	Building intercom systems - Part 2: Requirements for advanced security building intercom systems (ASBIS)	EN IEC 62820-2	-
IEC 62820-3-2	-	Building intercom systems - Part 3-2: Application guidelines - Advanced security building intercom systems (ASBIS)	EN IEC 62820-3-2	-

INTERNATIONAL STANDARD

Video surveillance systems for use in security applications - Part 4: Application guidelines

CONTENTS

FOREWORD	6
1 Scope	8
2 Normative references	8
3 Terms, definitions and abbreviated terms	8
3.1 Terms and definitions.....	8
3.2 Abbreviated terms.....	17
4 Planning considerations.....	18
4.1 General considerations	18
4.2 Security concept	19
4.2.1 General	19
4.2.2 Risk assessment	20
4.2.3 Selection of security grades.....	21
4.3 Developing the operational requirements	22
4.4 Site survey.....	22
4.5 Security of the VSCC room	22
4.6 System design including site plan	23
4.7 Developing the test plan	23
4.8 Installation, commissioning and hand over	23
4.9 Documenting the system.....	24
5 Operational requirements specifications	24
5.1 General.....	24
5.2 Purpose of the operational requirements.....	24
5.3 Content of the operational requirements	24
5.3.1 General	24
5.3.2 Basic objective/functionalities	24
5.3.3 Definition of surveillance limitations	25
5.3.4 Definition of the site(s) under surveillance	25
5.3.5 Definition of activity to be captured	25
5.3.6 System/picture performance	25
5.3.7 Period of operation	25
5.3.8 Conditions at the location	25
5.3.9 Resilience.....	25
5.3.10 Monitoring and image storage.....	26
5.3.11 Exporting images.....	26
5.3.12 Routine actions.....	26
5.3.13 Operational response	26
5.3.14 Operator workload	26
5.3.15 Training	26
5.3.16 Expansions.....	27
5.3.17 List of any other special factors not covered by the above	27
5.4 System operational criteria	27
5.4.1 General	27
5.4.2 Automation	27
5.4.3 Alarm response	27
5.4.4 System response times.....	28
6 Technical considerations (equipment selection and performance).....	29

6.1	General.....	29
6.2	Camera equipment.....	29
6.3	Camera and lens selection criteria	29
6.4	Camera selection.....	30
6.4.1	General	30
6.4.2	PTZ	30
6.5	Lens and housing selection.....	31
6.6	Site coverage/numbers of cameras	31
6.7	Object sizes and pixel density.....	32
6.7.1	General	32
6.7.2	Object size definitions and required pixel density in IP VSS.....	32
6.8	Field of view – Other considerations	36
6.9	Illumination	36
6.10	IP Video equipment.....	38
6.11	Tamper protection/detection.....	38
6.11.1	Camera tamper protection/detection	38
6.11.2	System tamper protection/detection	38
6.12	System integration	38
7	Video signal presentation	39
7.1	Display types	39
7.2	Resolution	40
8	Transmission.....	41
8.1	Principles.....	41
8.1.1	General	41
8.1.2	Selection of IP video performance classes.....	42
8.1.3	Interoperability.....	43
8.1.4	Interoperability with voice communication	43
8.2	Wired transmission links	43
8.3	Wireless transmission links	44
8.4	Key considerations for IP based transmission systems	45
9	Video performance characteristics	45
9.1	Image compression.....	45
9.2	Frame rate	46
9.3	Resolution	46
10	Storage requirements	47
11	Image storage and export.....	48
11.1	Format of the compressed video data	48
11.2	Encryption	48
11.3	Basic metadata (time, date, camera identifier)	48
11.4	Multiplexing format.....	49
11.5	Image enhancements.....	49
11.6	Image export.....	49
11.7	Replay of exported images.....	50
12	VSCC control room configuration.....	50
12.1	Control rooms or secure viewing area	50
12.2	Number, size and positioning of VSS video displays	50
12.3	Displays and screens mounted on or off the workstation	51
12.4	Recommended display sizes	51

12.5	Number of camera images per operator	51
12.6	Number of work stations	52
12.7	Equipment siting	52
12.8	Backup power supply provision	52
12.9	Operating temperature	53
12.10	Lightning and surge protection	53
13	Defining the test plan	53
13.1	Purpose of the test plan	53
13.2	User acceptance testing/inspection	53
13.3	Technical acceptance testing	53
13.3.1	Imaging chain consistency	53
13.3.2	Image quality	53
14	Documentational considerations (pre-installation)	56
14.1	General	56
14.2	Risk assessment	56
14.3	Operational requirements	56
14.4	Design specification	56
14.5	Site plan	56
14.6	Test plan	56
15	System installation and commissioning	56
15.1	Factory acceptance testing	56
15.2	Installation process	57
15.3	User acceptance testing, commissioning and handover	57
15.4	Declaration of conformance to standards	58
16	Final documentation	58
16.1	General	58
16.2	Complete system drawings	58
16.3	System commission (with camera specific audits)	59
16.4	Interface descriptions	59
16.5	Operating logbook VSS	59
16.6	Compliance with legislation (for information)	59
17	Operation of VSS	59
17.1	General	59
17.2	Behaviour in the event of malfunctions	61
17.3	At-site visual check	61
17.4	Deviation of requirements for at-site visual checks and maintenance	62
17.5	Maintenance	62
17.6	Inspection (part of preventive maintenance)	62
17.7	Service checks (part of preventive maintenance)	64
17.8	Repair (corrective maintenance)	64
17.9	Improvement	64
Annex A (informative)	Video standard formats	65
A.1	Current video standard format	65
A.2	Pixel densities for recognition of other objects of interest	65
Annex B (normative)	Test protocol for VSS target	66
B.1	Scope of the test	66
B.2	Test prerequisites	66
B.3	Preconditions	66

B.4	Face selection	66
B.5	Live view methodology (faces)	67
B.6	Live view methodology (VRN)	67
B.7	Recorded view methodology (faces)	67
B.8	Recorded view methodology (VRN).....	68
B.9	Motion	68
B.10	Faces: scoring criteria.....	68
B.11	VRN: scoring criteria	69
B.12	Heads control sheet (for example only)	71
B.13	VRN control sheet (for example only).....	72
Annex C (normative) Test method of image quality: Guidance for the use of the video test target		73
Annex D (informative) Guidelines to specifying VSS parameters and security gradings.....		79
D.1	VSS parameters.....	79
D.2	Suggested building blocks	79
D.3	Security gradings	80
D.4	Security grading by system view:	80
D.5	Security grading by size view:.....	81
D.6	Security grading by application view	81
D.7	Number of frames depending on the object speed in a scene width.....	85
Annex E (normative) Detection response testing and acceptability criteria		87
E.1	General.....	87
E.2	False and nuisance alarms	87
E.3	Setting the response time	88
E.4	PTZ response time test procedure	88
E.5	Observer cueing and prompting	88
E.6	Detection test locations.....	89
E.7	Target camouflage	89
E.8	Tests with moving targets	89
E.9	Test conditions	89
E.10	Testing a 'live' system.....	90
E.11	Detection test results tables	90
Bibliography.....		91
Figure 1 – Process visualization		19
Figure 2 – Structure of a security concept.....		20
Figure 3 – HD and UHD screen percentages occupied by various categories.....		34
Figure 4 – Pixel density formula.....		35
Figure 5 – Operation of a VSS		60
Figure B.1 – Heads control sheet.....		71
Figure B.2 – VRN control sheet example.....		72
Figure C.1 – Test charts		74
Figure C.2 – Key to Figure C.1		77
Figure C.3 – Avoiding optical distortion.....		78
Table 1 – Measures depending on security grades		23

Table 2 – Example of system feedback – PTZ control responding time, performance and operator	29
Table 3 – Group names for test charts	34
Table 4 – Typical lux levels	36
Table 5 – Examples of display technologies	39
Table 6 – Example resolutions	41
Table 7 – Wireless transmission options	44
Table 8 – Inspection cycles versus security grading	60
Table A.1 – Recommendations for recognition of some “non-human” objects	65
Table B.1 – Example auditor log sheet	69
Table B.2 – Example control room observer log sheet	69
Table B.3 – Example camera audit sheet	69
Table B.4 – Blank auditor log sheet	70
Table B.5 – Blank control room observer log sheet	70
Table B.6 – Blank camera audit sheet	70
Table C.1 – Test targets	73
Table D.1 – Suggested VSS building blocks	79
Table D.2 – Security grading by size view	81
Table D.3 – Security grading by application	81
Table D.4 – Security grading by critical infrastructure	83
Table D.5 – Number of frames depending of object speed – Low pixel density objects	85
Table D.6 – Number of frames depending of object speed - High Pixel Density Objects	86
Table E.1 – Detection test results	90

INTERNATIONAL ELECTROTECHNICAL COMMISSION

Video surveillance systems for use in security applications - Part 4: Application guidelines

FOREWORD

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IEC 62676-4 has been prepared by IEC technical committee 79: Alarm and electronic security systems. It is an International Standard.

This second edition cancels and replaces the first edition published in 2014. This edition constitutes a technical revision.

This edition includes the following significant technical changes with respect to the previous edition:

- a) implementing request for define a security concept (instead of just a risk analysis) (4.2);
- b) selection of security grades (4.2.3);

- c) complete redefinition of pixel densities (6.7) including new test charts (Annex C):
 - upgrade of previous MDORII system with 6 pixel densities (12,5 pixels/meter; 25 pixels/meter; 62,5 pixels/meter ; 125 pixels/meter; 250 pixels/meter; 1 000 pixels/meter) into new O2DCPVS system with 7 pixel densities (20 pixels/meter; 40 pixels/meter; 80 pixels/meter; 125 pixels/meter; 250 pixels/meter; 500 pixels/meter; 1 500 pixels/meter)
- d) operation of VSS (Clause 17);
- e) security grading by size view (Annex D, Table D.2);
- f) security grading by application (Annex D, Table D.3);
- g) security grading by critical infrastructure (Annex D, Table D.4);
- h) tables for number of frames depending on object speed (Annex D, Table D.5 and Table D.6);
- i) general updates of tables in entire document.

The text of this International Standard is based on the following documents:

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Full information on the voting for its approval can be found in the report on voting indicated in the above table.

The language used for the development of this International Standard is English

A list of all parts in the IEC 62676 series, published under the general title *Video surveillance systems for use in security applications*, can be found on the IEC website.

This document was drafted in accordance with ISO/IEC Directives, Part 2, and developed in accordance with ISO/IEC Directives, Part 1 and ISO/IEC Directives, IEC Supplement, available at www.iec.ch/members_experts/refdocs. The main document types developed by IEC are described in greater detail at www.iec.ch/publications.

The committee has decided that the contents of this document will remain unchanged until the stability date indicated on the IEC website under webstore.iec.ch in the data related to the specific document. At this date, the document will be

- reconfirmed,
- withdrawn, or
- revised.

1 Scope

This part of IEC 62676 describes the planning, design, installation, testing, commissioning, and maintaining of video surveillance systems (VSS) comprising image capture device(s), interconnection(s) and image handling device(s), for use in security applications within private or public spaces.

The objectives of this document are to:

- a) provide a framework to assist all interested parties in establishing their requirements,
- b) assist specifiers and users in determining the appropriate equipment required for a given application,
- c) provide means of evaluating objectively the performance of the VSS.

2 Normative references

The following documents are referred to in the text in such a way that some or all of their content constitutes requirements of this document. For dated references, only the edition cited applies. For undated references, the latest edition of the referenced document (including any amendments) applies.

IEC 62676-1-1:2013, *Video surveillance systems for use in security applications - Part 1-1: System requirements - General*

IEC 62676-1-2:2013, *Video surveillance systems for use in security applications - Part 1-2: System requirements - Performance requirements for video transmission*

IEC 62676-2 (all parts), *Video surveillance systems for use in security applications - Part 2-X: Video transmission protocols*

IEC 62676-2-1, *Video surveillance systems for use in security applications - Part 2-1: Video transmission protocols - General requirements*

IEC 62676-3, *Video surveillance systems for use in security applications - Part 3: Analog and digital video interfaces*

IEC 62820-2, *Building intercom systems - Part 2: Requirements for advanced security building intercom systems (ASBIS)*

IEC 62820-3-2, *Building intercom systems - Part 3-2: Application guidelines - Advanced security building intercom systems (ASBIS)*