



## NSAI/TC 006/WG 03 "Communication and Promotion of Standards"

### CCC.WG3.N006 Annual Report Construction Standards Consultative Committee 2018

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**NSAI**

# ANNUAL REPORT 2018

NSAI /TC 006 CONSTRUCTION  
STANDARDS CONSULTATIVE COMMITTEE

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## 1 Chairman's Statement

The inaugural meeting of the Construction Standards Consultative Committee was held in November 2017.

Following this meeting, a roadmap was prepared for the development of a comprehensive Work Programme with the aim of ensuring the most efficient use of resources in supporting the sectoral needs of standards activities across the construction spectrum in Ireland.

In 2018 two main committee meetings took place in April and November. In addition three working group meetings were convened, to assist in the preparation of the Construction Sector Work Programme (2019-2021), with very constructive inputs from the representatives of the key industry stakeholders.

Throughout 2018 considerable progress was made in the development of the Work Programme (2019-2021) in consultation with the key stakeholders.

Members also identified key focus areas for improvement around standards activities supporting the construction sector including, among other areas:

- the promotion and communication of standards;
- the recruitment of relevant experts on an ongoing basis;
- the increase of the level of engagement by experts at international level;
- the development of a formal structured training programme for Members participating in standards committees and working groups (at national and international level).

Valuable input by Members informed the development of the Work Programme for 2019-2021 and resulted in the establishment of a new WG for the promotion and communication of standards and standards activities in the construction sector.

It is intended to publish the Construction Sector Work Programme (2019 – 2021) in the second quarter of 2019.

I look forward to the continuing constructive engagement and collaboration of the key stakeholders in working with NSAI in this very challenging time for the Construction industry.

*Kevin Sheridan*

*Chair NSAI Construction Consultative Committee (CCC)*

*17/1/2019*

## 2 Introduction

The construction sector is one of Europe's biggest industries employing more than 12 million EU citizens. It is estimated that in the European Union 26 million workers depend on the construction sector in one way or another. It represents in Europe some 10% of GDP<sup>1</sup>.

The government of Ireland strategy for the Construction Sector i.e. '*Construction 2020 A Strategy for a Renewed Construction Sector*' confirms the need for a strong and sustainable construction sector in Ireland. The Strategy sets out a programme of action to "*deliver a strong, sustainable, well – financed, competitive and innovative approach to construction and housing, building to the highest standards, at realistic levels and with consumer protection at its heart.*"<sup>2</sup>

The construction industry by its nature is dependent on the voluntary standardization process, nationally and internationally, to establish and share best practice and support regulation. Standards form part of the technical and regulatory framework for national and EU policies for the built environment, energy usage, sustainability, open market and climate change.

The European Standards program for the construction sector, in which NSAI participates, includes more than 3000 work items on product standards and test methods, of which about 600 standards are or will be harmonized under the Construction Products Regulation (CPR) along with approximately 1500 supporting standards (test methods)<sup>1</sup>.

NSAI Standards budget in 2018 was circa 3 million euro and a staff of about 22 people. 30% of these resources were allocated to supporting the standardization needs of the construction industry, nationally and internationally. Construction related projects account for up to 50 % of NSAI's national standardisation work programme. There are around 320 experts participating in standards development activities nationally on construction related committees or directly engaged in international standards development.

Experts and Stakeholders from the construction industry continue to make considerable commitments to standards development activity in the construction sector in Ireland to ensure relevant standards are available to industry and regulators.

Nationally there are approximately 140 Technical bodies engaged in construction related standards development activities. A Technical Body (TB) may be a Technical Committee (TC), a Sub – Committee (SC) a Working Group (WG) or a Workshop (CEN only). See Annex A for a list of the main national construction related Technical Bodies.

These Committees/Technical Bodies operate under the functions outlined in the NSAI Act 1996 and the standard NSAI Terms of Reference for Consultative Committees. The current NSAI Construction Standards Consultative Committee was established in 2017 with its inaugural meeting taking place in November 2017. There were 2 meetings of the main Consultative Committee held in 2018.

The primary objective of the Committee is to provide NSAI with expert advice on general and standardization policy matters relating to construction in Ireland. The Chairs of all the NSAI Construction Committees are among the many stakeholders participating in the work of the Construction Standards Committee.

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<sup>1</sup> <https://www.cen.eu/work/aeras/construction/Pages/default.aspx>

<sup>2</sup> Construction 2020, A Strategy for a Renewed Construction Sector, Government Publications May 2014

This annual report provides a summary of the activities of the Construction Standards Consultative Committee in 2018.

Further detail of the activities in 2018 of individual construction related Technical Committees is available in the relevant individual NSAI construction committee annual reports for 2018.

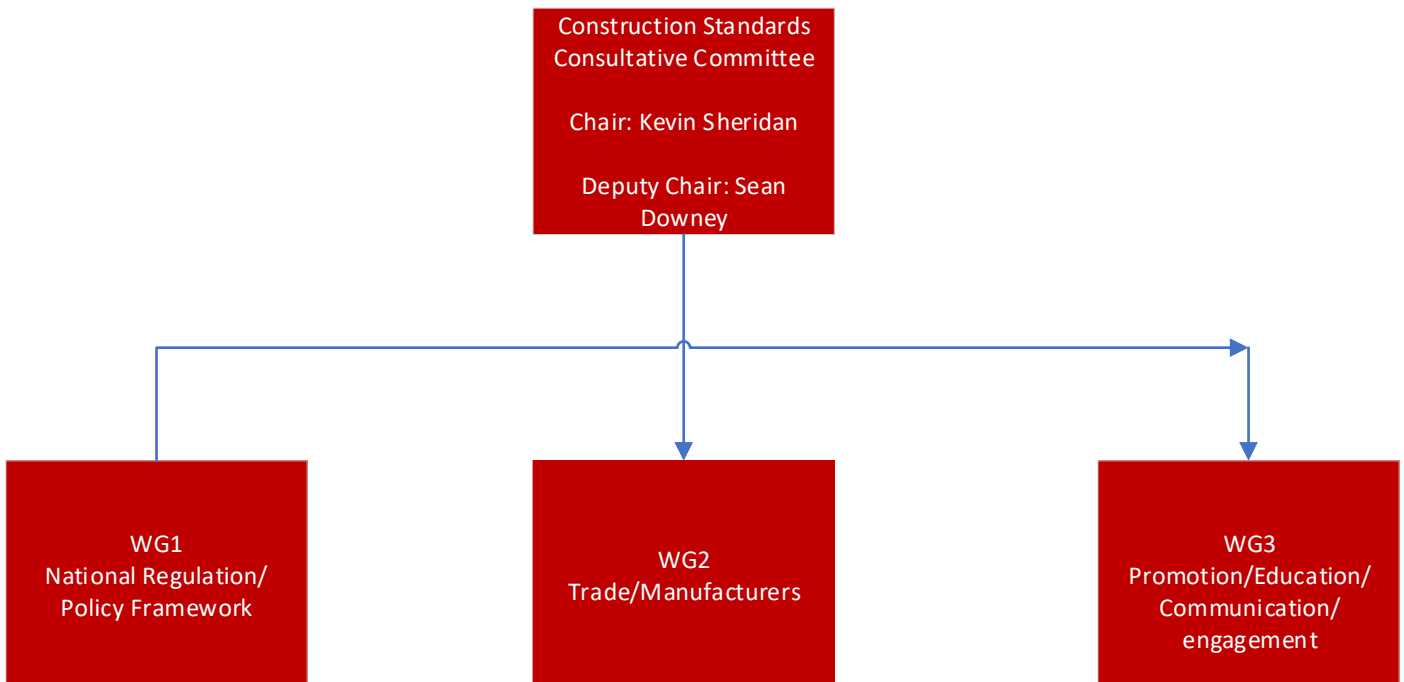
### 3 Scope of TC

To mirror the work of the CEN Construction Sector Network Forum which currently advises CEN BT on construction related matters.

## 4 Structure and Membership

### 4.1 Structure

The Figure below illustrates the structure of the Committee:



## 4.2 Members

| Organisation                              | Name                | Role  |
|---|---------------------|---|
| Consultant                                | Kevin Sheridan      | Chair Construction Standards Consultative Committee)              |
| CIF                                       | Sean Downey         | Deputy Chair CCC  |
| RIAI                                      | Peter Andrews       | Member  |
| DHPLG                                     | Sean Armstrong      | Chair Retrofit Committee<br>Chair Energy Performance of Buildings |
| IGBC                                      | Pat Barry           | Member  |
| Independent                               | Michael Byrne       | Chair Aggregates Panel  |
| Solas                                     | Jo Cahalin          | Member  |
| Engineers Ireland                         | Murt Coleman        | Member  |
| NDA                                       | Gerald Craddock     | Chair Universal Design Committee                                  |
| ACEI                                      | Richard Crowe       | Member  |
| Consultant                                | Liam Hearne         | Chair Gas Standards Consultative Committee                        |
| IBEC                                      | David Howard        | Member  |
| NDA                                       | James Hubbard       | Member  |
| NSAI Agrément                             | Martin English      | Member  |
| Housing Agency                            | Norman Jackson      | Member  |
| Garland Consulting                        | Noel Kane           | Chair Masonry Panel   |
| Enterprise Ireland                        | Neil Kerrigan       | Member  |
| Society of Chartered Surveyors of Ireland | Noel Larkin         | Member  |
| Consultant                                | Frank Lee           | Member  |
| Dept of Agriculture, Food and Marine      | Robert Leonard      | Member  |
| Colas Ireland                             | Gearoid Lohan       | Chair Road Standards Consultative Committee                       |
| Golder                                    | Michael Maher       | Chair Pyrite Committee  |
| Kavanagh, Mansfield and Partners          | Jim Mansfield       | Chair Eurocodes Committee   |
| SEAI                                      | Paul Martin         | Chair Building Services Standards Committee                       |
| CEI                                       | John McAuley        | Member  |
| Roadstone                                 | Dermot McCarthy     | Member  |
| Wavin                                     | Fergal McGeough     | Member  |
| Arcdox                                    | Ralph Montague      | Chair BIM Standards Committee                                     |
| Consultant                                | Michael Murray      | Chair Slating and Tiling Standards Committee                      |
| Irish Water                               | Liam Murray         | Member  |
| OPW                                       | Ciaran O'Connor     | Member  |
| CIT                                       | Brian O'Rourke      | Chair Concrete Standards Committee                                |
| LGMA                                      | Mairead Phelan      | Member  |
| Consultant                                | Bill Robinson       | Chair Timber Standards Consultative Committee                     |
| Michael Slattery and Associates           | Michael Slattery    | Chair Fire Safety Standards Committee                             |
| ICF                                       | Liam Smyth          | Member  |
| Tricel                                    | Michael Stack       | Member  |
| Homebond                                  | Conor Taaffe        | Member  |
| DHPLG                                     | John Wickham        | Member  |
| NSAI                                      | James Clarke        | National secretary support team                                   |
| NSAI                                      | Ken Murphy          | National secretary support team                                   |
| NSAI                                      | Elizabeth O'Ferrall | National secretary support team                                   |
| NSAI                                      | Alice Hanley        | National secretary support team                                   |
| NSAI                                      | Pat Hayes           | National secretary support team                                   |
| NSAI                                      | Fergal Finn         | National secretary support team                                   |
| NSAI                                      | Sabina Seneviratne  | National secretary support team                                   |
| NSAI                                      | Stewart Hickey      | National secretary support team                                   |
| NSAI                                      | Yvonne Wylde        | Manager Standards Technical                                       |
| NSAI                                      | Therese Clarke      | Technical Secretary CCC   |

## 5 Summary of 2018 Activities

### 5.1 Meetings

Committee members attended the following national meetings in NSAI as follows:

| Meeting No.                  | Date       |
|------------------------------|------------|
| 1. NSAI/TC006 Main committee | 25/4/2018  |
| 2. NSAI/TC006 WG1            | 10/9/2018  |
| 3. NSAI/TC006 WG2            | 10/9/2018  |
| 4. NSAI/TC006 WG1            | 1/10/2018  |
| 5. NSAI/TC006 WG2            | 1/10/2019  |
| 6. NSAI/TC006 Main committee | 14/11/2018 |

### 5.2 National Work

#### 5.2.1 Development of the national work programme for construction standards

The NSAI Construction Sector Work Programme provides an overview of the main standardization developments and strategic priority areas for 2019-2021.

Given the scale of the domain, the Work Programme has been developed in a format that will enhance industry stakeholders' abilities to identify areas of interest, and subsequently improve their ability to benefit from, and engage with National and International Standardization.

Contained within the Work Programme is a comprehensive and detailed list of National Committees (NC) related to construction. Each NC has been linked to the "mirrored" International Committee.

The direction of Standardization activities has been guided by the key stakeholders within the Construction Consultative Committee, thereby ensuring the efficient use of NSAI resources.

The data contained within the Work Programme represents a "snapshot in time" of a domain that is continuously updating. Going forward Standards Officers will update the data at regular intervals.

Some sample extracts from the Work Programme database can be seen in Annex B.

#### 5.2.2 Establishment of NSAI/TC 006 Working groups

WG1 provided advise/input into the development of the standards programme of work in terms of support required for national regulatory/policy framework.

WG2 provided advise/input into the development of the standards programme of work in terms of support required for trade in the construction sector and for manufacturers supplying to the industry (national and export).

WG3 was established following the TC 006 meeting in November 2018 with a plan for the first meeting to be held in January 2019. The function of WG 3 is to consider and advise in relation to communication, promotion and education needs in relation to construction standards across the industry.



### 5.2.3 Key focus areas

Members identified issues/areas for improvement to inform the construction standards work programme going forward, including the following:

- i. Increasing the number of experts and level of expert engagement in some areas of standardisation nationally e.g. Water Supply, Waste Water, Timber, Masonry Panel, and internationally e.g. Slating and tiling, Building services, BIM.
- ii. Recruiting new Members, in particular newly qualified/ in the early stage of their career, scientists and engineers to become involved in standardisation.
- iii. Improving promotion of standards and standards development activities within the construction industry.
- iv. Developing a training programme for experts involved in standards development

## 5.3 Regulatory Development/Update

Regulatory development/updates specific to NSAI construction related Technical Committees are available in the relevant annual reports.

The following National and European regulatory and policy developments related to the construction industry were brought to the attention of Members during 2018:

### 5.3.1 Irish Building Regulations - Public consultation on the following

Part L (Conservation of Fuel and Energy) Dwellings, the accompanying Technical Guidance Document L for Dwellings; and Draft DEAP 4.1

Part F (Ventilation), the accompanying Technical Guidance Document F; a draft Installation and Commissioning of Ventilation Systems for Dwellings - Achieving Compliance with Part F 2018

Directive 2010/31/EU of the European Parliament and of the Council on the energy performance of buildings (Recast) sets requirements at an EU level for Member States to improve the energy performance of buildings and to make an important contribution to the reduction of greenhouse gas emissions.

As part of the implementation of this directive it is proposed to amend Building Regulations Part L Conservation of Fuel and Energy- Dwellings, and Building Regulations Part F Ventilation.

### 5.3.2 Construction Products Regulation

Roadmap for the implementation of the Construction Products Regulation (CPR)

<http://ec.europa.eu/docsroom/documents/27302>

Survey on users' need for information on construction products

[https://publications.europa.eu/survey\\_CPR\\_users'\\_needs](https://publications.europa.eu/survey_CPR_users'_needs)

Construction Products Regulation – Survey on information needs among Members States

Authorities <https://ec.europa.eu/docsroom/documents/28684>

CPR – EC Consultation on review

[https://ec.europa.eu/growth/sectors/construction/productregulation/review\\_en](https://ec.europa.eu/growth/sectors/construction/productregulation/review_en)

## 6 Irish Publications

See Annex C for a list of Irish National publications, National and International publications adopted by NSAI, related to the construction industry, published in 2018.

## 7 Work programme for 2019 onwards

Completion of the construction standards Work Programme for the construction sector 2019-2021, end of first quarter 2019.

Publication of the construction sector standards Work Programme 2019-2021.

Planned meetings for the newly established WG3 – Communication and promotion of standards.

Development of Work Programme for WG3 – Communication and promotion of standards.

Continued function in providing NSAI with expert advice on general and standardization policy matters relating to construction in Ireland.

## 8 Photo of NSAI Construction Standards Consultative Committee



**NSAI Construction Standards Consultative Committee at NSAI Head Offices in Santry, on 29<sup>th</sup> November 2017**

**Back Row- From Left to right**

**Ciaran O'Connor** (OPW), **Brian O'Rourke** (Chair Concrete Committee), **Dr Michael Murray**, (Chair Slating and Tiling Committee), **Gearoid Lohan**, (Chair Roads Committee), **James Hubbard**, ((A) Universal Design Committee), **Jim Mansfield**, (Chair Eurocodes Committee), **Liam Hearne** (Chair Gas Stds Committee), **Michael Slattery** (Chair Fire Stds Committee), **Ralph Montague** (Chair BIM Committee), **Richard Crowe**, (ACEI) , **John McAuley** ( Chair Electrotechnical Committee, **Noel Larkin** (SCSI), **Murt Coleman** (Engineers Ireland) , **Dermot McCarthy** (Aggregates Panel), **Norman Jackson** (Housing Agency), **Pat Barry** (IGBC), **Martin English** (NSAI Sustainability and Built Environment), **Peter Andrews**, (RIAI), **Liam Smyth**, (ICF), **John Wickham** (DHPLG).

**Front Row- Left to right**

**Bill Robinson**, (Chair Timber Standards Committee), **Noel Kane** (Chair Masonry Panel), **Kevin Sheridan**, (Committee Chairman CSCC,) **Yvonne Wylde**, (Manager Standards Technical) **Therese Clarke**, (Standards Officer NSAI , Secretary Construction Standards Committee)

## Annex A

### List of NSAI National Technical Bodies (construction)

| Technical Body       | Title  |
|----------------------|--|
| NSAI/TC 8/WG 22      | Trussed rafters and timber in buildings                        |
| NSAI/TC 8/WG 23      | Timber frame construction                                      |
| NSAI/TC 58/SC 1      | Testing and categorization                                     |
| NSAI/TC 58/SC 2      | Remediation works (Standby)                                    |
| NSAI/TC 12           | Slating and Tiling   |
| NSAI/TC 3/SC 3       | Aggregates Panel   |
| NSAI/TC 8            | Timber   |
| NSAI/TC 17/SC 5/WG 6 | Noise Reducing Devices   |
| NSAI/TC 17/WG 1      | Asphalt  |
| NSAI/TC 3/SC 1       | Concrete   |
| NSAI/TC 17/WG 2      | Aggregates Panel   |
| NSAI/TC 3            | Concrete Committee   |
| NSAI/TC 17           | Roads Standards  |
| NSAI/TC 17/WG 3      | Binders  |
| NSAI/TC 63           | Concrete Blocks Committee                                      |
| NSAI/TC 17/WG 7      | SR 16_SR 18  |
| NSAI/TC 15/SC 2      | Concrete   |
| NSAI/TC 15/SC 3      | Steel  |
| NSAI/TC 15/SC 7      | Geotechnics  |
| NSAI/TC 16           | Fire Safety  |
| NSAI/TC 58           | Reactive pyrite in sub-floor hardcore material                 |
| NSAI/TC 15           | National Eurocodes   |
| NSAI/TC 6            | Construction Consultative Committee                            |
| NSAI/TC 47/SC 22     | Building Information Modelling                                 |
| NSAI/TC 17/SC 5/WG 1 | Crash Barriers, safety fences, guard rails and bridge parapets |
| NSAI/TC 17/SC 5/WG 2 | Horizontal Road Signs  |
| NSAI/TC 17/SC 5/WG 3 | Vertical Signs   |

| Technical Body        | Title   |
|-----------------------|---|
| NSAI/TC 31/SC 2/WG 16 | Factory production control  |
| NSAI/TC 31/SC 2/WG 18 | External thermal insulation composite systems                               |
| NSAI/TC 31/SC 2/WG 19 | Polyethylene foam   |
| NSAI/TC 31/SC 2/WG 3  | Mineral wool  |
| NSAI/TC 12/SC 11      | Double skin metal faced insulating sandwich panels for roofing and cladding |
| NSAI/TC 31/SC 2       | Thermal insulating materials and products                                   |
| NSAI/TC 16/WG 1       | Fire Safety in buildings  |
| NSAI/TC 47/SC 25/WG 2 | Mirror Committee of CEN TC135 WGs   |
| NSAI/TC 17/SC 5       | Road Equipment  |
| NSAI/TC 47/SC 2       | Windows & Doors   |
| NSAI/TC 3/SC 2        | Masonry   |
| NSAI/TC 15/SC 1       | Actions   |
| NSAI/TC 15/SC 5       | Timber  |
| NSAI/TC 15/SC 6       | Masonry   |
| NSAI/TC 15/SC 20      | HG Bridges  |
| NSAI/TC 15/SC 21      | HG Fire   |
| NSAI/TC 19            | Energy Performance of Buildings   |
| NSAI/TC 46            | Construction Products   |
| NSAI/TC 17/SC 5/WG 11 | Variable Message Signs  |
| NSAI/TC 8/WG 21       | Timber grading - Machine and visual strength grading                        |
| NSAI/TC 12/SC 1       | Design of timber battens and fixings  |
| NSAI/TC 12/SC 2       | Concrete roofing tiles  |
| NSAI/TC 12/SC 3       | Roofing underlays   |
| NSAI/TC 12/SC 4       | Fibre-cement tiles  |
| NSAI/TC 8/WG 24       | Timber fencing/preservatives  |
| NSAI/TC 17/WG 4       | Surface Dressing  |
| NSAI/TC 17/SC 5/WG 10 | Passive Safety of Support Structures for Road Equipment                     |
| NSAI/TC 31/SC 2/WG 1  | Common general test methods   |
| NSAI/TC 31/SC 2/WG 10 | Building equipment and industrial installations                             |
| NSAI/TC 31/SC 2/WG 11 | Vacuum insulation products (VIP)  |
| NSAI/TC 31/SC 2/WG 12 | Prefabricated products of bonded expanded perlite                           |



| <b>Technical Body</b>            | <b>Title</b>   |
|----------------------------------|--|
| NSAI/TC 31/SC 2/WG 14            | Terminology  |
| NSAI/TC 31/SC 2/WG 20            | Expanded clay lightweight aggregates                           |
| NSAI/TC 31/SC 2/WG 21            | Reflective insulation products                                 |
| NSAI/TC 31/SC 2/WG 23            | Vegetable fibers based products (VFBP)                         |
| NSAI/TC 31/SC 2/WG 9             | Mineral bonded wood wool (including multi-layered products)    |
| NSAI/TC 8/WG 25                  | Wood-based panels  |
| NSAI/TC 8/WG 26                  | Round and sawn timber  |
| NSAI/TC 19/WG 1                  | Overarching Standards  |
| NSAI/TC 19/WG 2                  | Buildings  |
| NSAI/TC 19/WG 3                  | Technical Building Systems                                     |
| NSAI/TC 47/SC 25/WG 1            | Balloting for CEN TC 135                                       |
| NSAI/TC 3/SC 4                   | Mica/Pyrite Blocks   |
| NSAI/TC 47/SC 25                 | Execution of steel structures and aluminium structures         |
| NSAI/TC 47/SC 10                 | Slip resistance of pedestrian surfaces - Methods of evaluation |
| NSAI/TC 15/SC 4                  | Composite Steel/concrete                                       |
| NSAI/TC 61                       | Chimney Adhoc  |
| NSAI/TC 46/WG 3                  | Planning   |
| NSAI/TC 46/WG 4                  | General  |
| NSAI/TC 46/WG 5                  | Fire   |
| NSAI/TC 47/SC 2/WG 1             | Building Hardware  |
| NSAI/TC 47/SC 21/CEN-CLC-BT WG 9 | CEN-CLC-BT WG009   |
| NSAI/TC 47/SC 21/WG 215          | CEN-BT-WG 215  |
| NSAI/TC 16/WG 5                  | Emergency Lighting   |
| NSAI/TC 16/WG 2                  | Fire Alarms  |
| NSAI/TC 16/WG 3                  | Fire Service   |
| NSAI/TC 16/WG 4                  | Fire Safety of furniture & textiles                            |
| NSAI/TC 31                       | Building Services Committee                                    |
| NSAI/TC 31/SC 4                  | Ventilation for buildings                                      |
| NSAI/TC 31/SC 3/WG 11            | Revision of EN 14624   |
| NSAI/TC 31/SC 3/WG 6             | Revision of EN 378   |
| NSAI/TC 31/SC 3                  | Refrigerating systems, safety and environmental requirements   |

| <b>Technical Body</b> | <b>Title</b>   |
|-----------------------|--|
| NSAI/TC 31/SC 5       | Air filters for general air and other gases cleaning |
| NSAI/TC 10/WG 2       | Pipes  |
| NSAI/TC 40            | Retrofit of existing dwellings                       |
| NSAI/TC 33/SC 3       | Certification and Inspection of Cranes               |
| NSAI/TC 33/SC 2       | Tower Cranes and Self Erecting Cranes                |
| NSAI/TC 33/SC 4       | Bridge and gantry cranes                             |
| NSAI/TC 33/SC 1       | Cranes Safety General                                |
| NSAI/TC 47/SC 23      | Facilities Management                                |
| NSAI/TC 11/WG 6       | SR 66 Drafting                                       |
| NSAI/TC 11/WG 2       | Small wastewater treatment systems                   |
| NSAI/TC 11/WG 3       | Water service road furniture                         |
| NSAI/TC 11/WG 1       | Pipes and Networks                                   |
| NSAI/TC 11/WG 5       | Use of treated wastewater                            |
| NSAI/TC 11            | Wastewater Engineering                               |
| NSAI/TC 11/WG 4       | Guidance to management of FOG                        |



## Annex B Construction Sector Work Programme

THIS SHEET CONTAINS A **COMPREHENSIVE** LIST OF NATIONAL COMMITTEES (NC) RELATED TO CONSTRUCTION. THE NC HAS BEEN LINKED TO THE INTERNATIONAL COMMITTEES MIRRORED/MONITORED

| NSAI TC        | Technical Secretary    | National Committee Title            | no of committee members | Current National Standards | NWI Approved 2018 - 2021   | International Committee Reference                | International Committee Title                                    | International Published Standards | CEN Work programme |
|----------------|------------------------|-------------------------------------|-------------------------|----------------------------|----------------------------|--|--|-----------------------------------|--------------------|
| NSAI/TC 3/SC 1 | ken.murphy@nsai.ie     | Concrete                            | 14                      | 1                          | 0                          | <a href="#">CEN/TC 104/SC 1</a>                  | Concrete - Specification, performance, production and conformity |                                   |                    |
| NSAI/TC 3/SC 2 | ken.murphy@nsai.ie     | Masonry                             | 17                      | 1                          | 0                          | <a href="#">CEN/TC 125</a>                       | Masonry  | 61                                | 3                  |
| NSAI/TC 63     | ken.murphy@nsai.ie     | Concrete Blocks Committee           | 26                      | 1                          | -                          |  |  |                                   |                    |
| NSAI/TC 6      | therese.clarke@nsai.ie | Construction Consultative Committee | 43                      | 0                          | 0                          | -  | -  | -                                 | -                  |
| NSAI/TC 8      | pat.hayes@nsai.ie      | Timber                              | 19                      | 13                         | 3                          | <a href="#">CEN/TC 38</a>                        | Durability of wood and derived materials                         | 60                                | 30                 |
|                |                        |                                     |                         |                            |                            | <a href="#">CEN/TC 112</a>                       | Wood-based panels  | 63                                | 8                  |
|                |                        |                                     |                         |                            |                            | <a href="#">CEN/TC 124</a>                       | Timber structures  | 41                                | 18                 |
|                |                        |                                     |                         |                            |                            | <a href="#">CEN/TC 124/WG 1</a>                  | Test methods   | 19                                | 6                  |
|                |                        |                                     |                         |                            |                            | <a href="#">CEN/TC 124/WG 2</a>                  | Solid timber   | 13                                | 1                  |
|                |                        |                                     |                         |                            |                            | <a href="#">CEN/TC 124/WG 3</a>                  | Glued laminated timber   | 3                                 | 3                  |
|                |                        |                                     |                         |                            |                            | <a href="#">CEN/TC 124/WG 4</a>                  | Connectors   | 4                                 | 5                  |
|                |                        |                                     |                         |                            |                            | <a href="#">CEN/TC 124/WG 5</a>                  | Prefabricated wall, floor and roof elements                      | 1                                 | 1                  |
|                |                        |                                     |                         |                            |                            | <a href="#">CEN/TC 124/WG 6</a>                  | Wood poles   | 1                                 | 1                  |
|                |                        |                                     |                         |                            |                            | <a href="#">CEN/TC 175</a>                       | Round and sawn timber  | 74                                | 13                 |
|                |                        |                                     |                         |                            | <a href="#">ISO/TC 89</a>  | Wood-based panels                                | 45   | 4                                 |                    |
|                |                        |                                     |                         |                            | <a href="#">ISO/TC 165</a> | Timber structures                                | 91   | 16                                |                    |
|                |                        |                                     |                         |                            | ISO/TC 287                 | Chain of custody of wood and wood-based products | 1  | 0                                 |                    |

Figure 1. Sample extract from the NSAI Construction Sector Work Programme (Tab 1: NSAI Construction Committees)

| KEY  | Published                    | Published   |  |             |
|--|------------------------------|---|--|-------------|
|  | Approved WI                  |   |  | Approved WI |
|  | Planned WI                   |   |  |             |
| THIS SHEET CONTAINS A <b>COMPREHENSIVE</b> LIST OF IRISH STANDARDS PUBLISHED or UNDER DEVELOPMENT. THIS INCLUDES NATIONAL ANNEXES TO ENs |                              |   |  |             |
| National Committee   | Reference                    | Title   | Notes (i.e. Standard is driven by; Dept. Request/Directive/Mandate)                |             |
| NSAI TC 16   | I.S. 291:2015+A1:201X        | Selection, commissioning, installation, inspection and maintenance of portable fire extinguishers   | Systematic Review  |             |
| NSAI TC 16   | I.S. 3218:20XX               | Fire detection and alarm systems for buildings - System design, installation, servicing and maintenance   | Systematic Review  |             |
| NSAI TC 16   | I.S. 391:201x                | Fire mains for buildings - Installation, commissioning, maintenance and testing   | Stakeholders demand  |             |
| NSAI TC 17   | I.S. 844:201x                | Transportation and installation of bituminous materials for roads and other paved areas   | Industry request   |             |
| NSAI TC 17   | I.S. 888:2016                | Code of Practice for the procurement and use of unbound granular fill hardcore material for use under concrete floors                                 | Government request - Recommendation of the report or the pyrite panel 2012         |             |
| NSAI TC 17   | I.S. EN 13055-1:2002/NA:2010 | Lightweight aggregates - Part 1: Lightweight aggregates for concrete, mortar and grout  |  |             |
| NSAI TC 17   | I.S. EN 13139:2002+NA:2010   | Aggregates for mortar   |  |             |
| NSAI TC 17   | I.S. EN 13383-1:2002/NA-2010 | Irish National Annex to Armourstone - Part 1: Specification   |  |             |
| NSAI TC 17   | I.S. EN 13383-1:2002+NA:2010 | Armourstone - Part 1: Specification (including Irish National Annex)  |  |             |
| NSAI TC 17   | S.R. 16:2016                 | Guidance on the use of I.S. EN 12620:2002+A1:2008 - Aggregates for concrete   | Industry request - CPR   |             |
| NSAI TC 17   | S.R. 16:201X                 | Guidance on the use of I.S. EN 12620:201X - Aggregates for concrete   | Publication of EN 12620 currently under development in CEN -Industry request - CPR |             |
| NSAI TC 17   | S.R. 17:2004                 | Guidance on the use of I.S. EN 13043:2002 - Aggregates for bituminous mixtures and surface treatments for roads, airfields and other trafficked areas | Industry request - CPR   |             |

Figure 2. Sample extract from the NSAI Construction Sector Work Programme (Tab 2: National Standards Work Programme)

**THIS SHEET CONTAINS A COMPREHENSIVE LIST OF CEN COMMITTEES RELATED TO THE CONSTRUCTION. EACH CEN COMMITTEE HAS A LINK TO THE LIST OF CEN TECHNICAL BODIES HOMEPAGE**

| CEN Committee Reference        | CEN Committee Title   | Classification 1         | Group Sector (Cen Group Sectors) | Include Construction review June 2018 | Mapped | Documents - Draft | Document - Pub | Status | NSAI notes  |
|--------------------------------|---|--------------------------|----------------------------------|---------------------------------------|--------|-------------------|----------------|--------|---|
| <a href="#">CEN/CLC/JTC 11</a> | Accessibility in the built environment                          | Accessability            |                                  | 3                                     | 3      | 1                 |                |        |   |
| <a href="#">CEN/TC 10</a>      | Lifts, escalators and moving walks                              | Mechanical and machinery | Mechanical engineering           | 2                                     | 2      | 12                | 53             |        | Standards takers, except for some input on accessibility issues   |
| <a href="#">CEN/TC 33</a>      | Doors, windows, shutters, building hardware and curtain walling | Construction             | Building and civil engineering   | 2                                     | 1      | 25                | 166            |        | Electronic committee. No national engagement. CE marking will become necessary in short term. Establish current status of EN's; workshop; then reconsider committee |
| <a href="#">CEN/TC 38</a>      | Durability of wood and wood-based products                      | Construction             | Building and civil engineering   | 3                                     | 1      | 9                 | 86             |        |   |

Figure 3. Sample extract from the NSAI Construction Sector Work Programme (Tab 1: CEN Construction Committees)

## Annex C

### NSAI Publications in the Construction sector 2018

| Sector Description  | Reference                  | Title_NSAI  |
|---|----------------------------|---|
| <b>National Publications – Construction Sector 2018</b>                             |                            |   |
| <b>Building and civil engineering</b>   | I.S. 465:2018              | Concrete Block failure; Assessment, Testing and Categorization Protocol   |
| <b>Building and civil engineering</b>   | S.R. 28:2018               | Recommendation for the use and implementation of the I.S. EN 13108 series bituminous mixtures – material specifications |
| <b>Building and civil engineering</b>   | S.R. 61:2018               | Guidance on the use of I.S. EN 12271:2006 Surface Dressing –Requirements  |
| <b>Building and civil engineering</b>   | S.R. 62:2018               | Guidance on the use of I.S. EN 12271:2006 Surface Dressing –Requirements  |
| <b>Building and civil engineering</b>   | S.R. 325:2013+A2:2018      | Recommendations for the design of masonry structures in Ireland to Eurocode 6   |
| <b>Adopted European &amp; International publications – Construction Sector 2018</b> |                            |   |
| <b>Construction/Civil</b>   | I.S. EN 14428:2015+A1:2018 | Shower enclosures - Functional requirements and test methods  |
| <b>Construction/Civil</b>   | I.S. EN 14516:2015+A1:2018 | Baths for domestic purposes   |
| <b>Construction/Civil</b>   | I.S. EN 14527:2016+A1:2018 | Shower trays for domestic purposes  |
| <b>Construction/Civil</b>   | I.S. EN 14528:2015+A1:2018 | Bidets - Functional requirements and test methods   |

| Sector Description                                     | Reference                  | Title_NSAI  |
|--|----------------------------|---|
| <b>Construction/Civil</b>                              | I.S. EN 14688:2015+A1:2018 | Sanitary appliances - Wash basins - Functional requirements and test methods  |
| <b>Construction/Civil</b>                              | I.S. EN 16205:2013+A1:2018 | Laboratory measurement of walking noise on floors   |
| <b>ACOUSTICS AND SOUND INSULATION</b>                  | I.S. EN ISO 3822-3:2018    | Acoustics - Laboratory tests on noise emission from appliances and equipment used in water supply installations - Part 3: Mounting and operating conditions for in-line valves and appliances (ISO 3822-3:2018)   |
| <b>ACOUSTICS AND SOUND INSULATION</b>                  | I.S. EN ISO 16283-2:2018   | Acoustics - Field measurement of sound insulation in buildings and of building elements - Part 2: Impact sound insulation (ISO 16283-2:2018)  |
| <b>ACOUSTICS AND SOUND INSULATION</b>                  | S.R. CEN/TR 16961:2018     | Declaration of uncertainties in test reports  |
| <b>AGGREGATES</b>                                      | I.S. EN 16236:2018         | Assessment and Verification of the Constancy of Performance (AVCP) of aggregates - Type testing and Factory Production Control  |
| <b>&amp; InternationalAIR DISTRIBUTION</b>             | S.R. CEN/TS 16244:2018     | Ventilation in hospitals - Coherent hierarchic structure and common terms and definitions for a standard related to ventilation in hospitals  |
| <b>AIR DISTRIBUTION</b>                                | S.R. CEN/TS 17153:2018     | Ventilation for buildings - Correction of air flow rate according to ambient conditions   |
| <b>BUILDING AND CONSTRUCTION ENVIRONMENTAL ASPECTS</b> | S.R. CEN/TR 17304:2018     | Construction products - Assessment of release of dangerous substances - Determination of emissions into indoor air of ammonia from cellulose insulation at 90 % RH  |
| <b>BUILDING AND CONSTRUCTION ENVIRONMENTAL ASPECTS</b> | S.R. CEN/TS 16637-1:2018   | Construction products - Assessment of release of dangerous substances - Part 1: Guidance for the determination of leaching tests and additional testing steps   |
| <b>BUILDING AND CONSTRUCTION ENVIRONMENTAL ASPECTS</b> | S.R. CEN/TS 17195:2018     | Construction products: Assessment of release of dangerous substances - Analysis of inorganic substances in eluates  |
| <b>BUILDING AND CONSTRUCTION ENVIRONMENTAL ASPECTS</b> | S.R. CEN/TS 17196:2018     | Construction products: Assessment of release of dangerous substances - Digestion by aqua regia for subsequent analysis of inorganic substances  |
| <b>BUILDING AND CONSTRUCTION ENVIRONMENTAL ASPECTS</b> | S.R. CEN/TS 17197:2018     | Construction products: Assessment of release of dangerous substances - Analysis of inorganic substances in digests and eluates - Analysis by Inductively Coupled Plasma - Optical Emission Spectrometry (ICP-OES) |

| Sector Description                                     | Reference                | Title_NSAI   |
|--|--------------------------|--|
| <b>BUILDING AND CONSTRUCTION ENVIRONMENTAL ASPECTS</b> | S.R. CEN/TS 17200:2018   | Construction products: Assessment of release of dangerous substances - Analysis of inorganic substances in digests and eluates - Analysis by Inductively Coupled Plasma - Mass Spectrometry (ICP-MS)                             |
| <b>BUILDING AND CONSTRUCTION ENVIRONMENTAL ASPECTS</b> | S.R. CEN/TS 17201:2018   | Construction products: Assessment of release of dangerous substances - Content of inorganic substances - Methods for analysis of aqua regia digests  |
| <b>BUILDING AND CONSTRUCTION ENVIRONMENTAL ASPECTS</b> | S.R. CEN/TS 17216:2018   | Construction products - Assessment of release of dangerous substances - Determination of activity concentrations of radium-226, thorium-232 and potassium-40 in construction products using semiconductor gamma-ray spectrometry |
| <b>BUILDING DESIGN</b>                                 | I.S. EN 13200-3:2018     | Spectator facilities - Part 3: Separating elements - Requirements  |
| <b>CENTRAL HEATING BOILERS</b>                         | I.S. EN 13203-6:2018     | Gas-fired domestic appliances producing hot water - Part 6: Assessment of energy consumption of adsorption and absorption heat pumps   |
| <b>CERAMIC TILES</b>                                   | I.S. EN ISO 10545-2:2018 | Ceramic tiles - Part 2: Determination of dimensions and surface quality (ISO 10545-2:2018)   |
| <b>CERAMIC TILES</b>                                   | I.S. EN ISO 10545-3:2018 | Ceramic tiles - Part 3: Determination of water absorption, apparent porosity, apparent relative density and bulk density (ISO 10545-3:2018)  |
| <b>CONCRETE</b>  | I.S. EN 12390-14:2018    | Testing hardened concrete - Part 14: Semi-adiabatic method for the determination of heat released by concrete during its hardening process   |
| <b>CONCRETE</b>  | S.R. CEN/TR 17172:2018   | Validation testing program on chloride penetration and carbonation standardized test methods   |
| <b>DOORS AND WINDOWS</b>                               | I.S. EN 12216:2018       | Shutters, external blinds, internal blinds - Terminology, glossary and definitions   |
| <b>DOORS AND WINDOWS</b>                               | I.S. EN 12519:2018       | Windows and pedestrian doors - Terminology   |
| <b>DOORS AND WINDOWS</b>                               | I.S. EN 13126-6:2018     | Building hardware - Hardware for windows and door height windows - Requirements and test methods - Part 6: Variable geometry stay hinges (with or without a friction stay)   |
| <b>DOORS AND WINDOWS</b>                               | I.S. EN 14351-2:2018     | Windows and doors - Product standard, performance characteristics - Part 2: Internal pedestrian doorsets   |

| Sector Description                           | Reference                         | Title_NSAI  |
|--|-----------------------------------|---|
| <b>DRAINAGE EQUIPMENT</b>                    | I.S. EN 15885:2018                | Classification and characteristics of techniques for renovation, repair and replacement of drains and sewers  |
| <b>DRAINAGE EQUIPMENT</b>                    | I.S. EN 16932-1:2018              | Drain and sewer systems outside buildings - Pumping systems - Part 1: General requirements  |
| <b>DRAINAGE EQUIPMENT</b>                    | I.S. EN 16932-2:2018              | Drain and sewer systems outside buildings - Pumping systems - Part 2: Positive pressure systems   |
| <b>DRAINAGE EQUIPMENT</b>                    | I.S. EN 16932-3:2018              | Drain and sewer systems outside buildings - Pumping systems - Part 3: Vacuum systems  |
| <b>DRAINAGE EQUIPMENT</b>                    | I.S. EN 16941-1:2018              | On-site non-potable water systems - Part 1: Systems for the use of rainwater  |
| <b>ELECTRIC TRACTION EQUIPMENT</b>           | I.S. EN 50129:2018                | Railway applications - Communication, signalling and processing systems - Safety related electronic systems for signalling  |
| <b>ELECTRICAL INSTALLATIONS IN BUILDINGS</b> | S.R. HD 60364-4-42:2011/A1:2015   | Low voltage electrical installations - Part 4-42: Protection for safety - Protection against thermal effects  |
| <b>ELECTRICAL INSTALLATIONS IN BUILDINGS</b> | S.R. HD 60364-5-534:2016          | Low-voltage electrical installations - Part 5-53: Selection and erection of electrical equipment - Isolation, switching and control - Clause 534: Devices for protection against transient overvoltages |
| <b>ELECTRICAL INSTALLATIONS IN BUILDINGS</b> | S.R. HD 60364-5-551:2010/A11:2016 | Low-voltage electrical installations - Part 5-55: Selection and erection of electrical equipment - Other equipment - Clause 551: Low-voltage generating sets  |
| <b>ELECTRICAL INSTALLATIONS IN BUILDINGS</b> | S.R. HD 60364-5-557:2013          | Low-voltage electrical installations - Part 5-557: Selection and erection of electrical equipment - Auxiliary circuits  |
| <b>ELECTRICAL INSTALLATIONS IN BUILDINGS</b> | S.R. HD 60364-5-557:2013/A11:2016 | Low-voltage electrical installations - Part 5-557: Selection and erection of electrical equipment - Auxiliary circuits  |
| <b>ELECTRICAL INSTALLATIONS IN BUILDINGS</b> | S.R. HD 60364-7-704:2018          | Low voltage electrical installations - Part 7-704: Requirements for special installations or locations - Construction and demolition site installations   |
| <b>ELECTRICAL INSTALLATIONS IN BUILDINGS</b> | S.R. HD 60364-7-712:2016          | Low-voltage electrical installations - Part 7-712: Requirements for special installations or locations - Photovoltaic (PV) systems  |
| <b>ELECTRICAL INSTALLATIONS IN BUILDINGS</b> | S.R. HD 60364-8-1:2015            | Low-voltage electrical installations - Part 8-1: Energy efficiency  |

| Sector Description                           | Reference                    | Title_NSAI  |
|--|------------------------------|---|
| <b>ELECTRICAL INSTALLATIONS IN BUILDINGS</b> | S.R. HD 60364-8-2:2018       | Low-voltage electrical installations - Part 8-2: Prosumer's low-voltage electrical installations  |
| <b>ELECTRICAL MEASURING EQUIPMENT</b>        | I.S. EN 50470-1:2006/A1:2018 | Electricity metering equipment (a.c.) - Part 1: General requirements, tests and test conditions - Metering equipment (class indexes A, B and C)   |
| <b>ELECTRICAL MEASURING EQUIPMENT</b>        | I.S. EN 50470-2:2006/A1:2018 | Electricity metering equipment (a.c.) - Part 2: Particular requirements - Electromechanical meters for active energy (class indexes A and B)  |
| <b>ELECTRICAL MEASURING EQUIPMENT</b>        | I.S. EN 50470-3:2006/A1:2018 | Electricity metering equipment (a.c.) - Part 3: Particular requirements - Static meters for active energy (class indexes A, B and C)  |
| <b>ELECTRICAL MEASURING EQUIPMENT</b>        | I.S. EN IEC 62056-6-2:2018   | Electricity metering data exchange - The DLMS/COSEM suite - Part 6-2: COSEM interface classes   |
| <b>FIRE TESTS</b>                            | I.S. EN 1364-2:2018          | Fire resistance tests for non-loadbearing elements - Part 2: Ceilings   |
| <b>FIRE TESTS</b>                            | I.S. EN 1366-11:2018         | Fire resistance tests for service installations - Part 11: Fire protective systems for cable systems and associated components  |
| <b>FIRE TESTS</b>                            | I.S. EN 15254-4:2018         | Extended application of results from fire resistance tests - Non-loadbearing walls - Part 4: Glazed constructions   |
| <b>FIRE TESTS</b>                            | I.S. EN 15254-5:2018         | Extended application of results from fire resistance tests - Non-loadbearing walls - Part 5: Metal sandwich panel construction  |
| <b>FIRE TESTS</b>                            | I.S. EN 15254-7:2018         | Extended application of results from fire resistance tests - Non-loadbearing ceilings - Part 7: Metal sandwich panel construction   |
| <b>FIRE TESTS</b>                            | I.S. EN 15269-11:2018        | Extended application of test results for fire resistance and/or smoke control for door, shutter and openable window assemblies, including their elements of building hardware - Part 11: Fire resistance for operable fabric curtains |
| <b>FIRE TESTS</b>                            | I.S. EN ISO 1716:2018        | Reaction to fire tests for products - Determination of the gross heat of combustion (calorific value) (ISO 1716:2018)   |
| <b>FLOOR AND SURFACING</b>                   | I.S. EN 13892-9:2018         | Methods of test for screed materials - Part 9: Dimensional stability  |
| <b>GAS CLEANING</b>                          | I.S. EN ISO 29463-2:2018     | High-efficiency filters and filter media for removing particles in air - Part 2: Aerosol production, measuring equipment and particle-counting statistics (ISO 29463-2:2011)  |



| Sector Description                       | Reference                | Title_NSAI   |
|--|--------------------------|--|
| <b>GAS CLEANING</b>                      | I.S. EN ISO 29463-3:2018 | High-efficiency filters and filter media for removing particles in air - Part 3: Testing flat sheet filter media (ISO 29463-3:2011)                                    |
| <b>GAS CLEANING</b>                      | I.S. EN ISO 29463-4:2018 | High-efficiency filters and filter media for removing particles in air - Part 4: Test method for determining leakage of filter elements-Scan method (ISO 29463-4:2011) |
| <b>GAS CLEANING</b>                      | I.S. EN ISO 29463-5:2018 | High-efficiency filters and filter media for removing particles in air - Part 5: Test method for filter elements (ISO 29463-5:2011)                                    |
| <b>GASEOUS FUELS AND COMBUSTIBLE GAS</b> | I.S. EN 437:2018         | Test gases - Test pressures - Appliance categories   |
| <b>GEOTECHNICS</b>                       | I.S. EN 16907-1:2018     | Earthworks - Part 1: Principles and general rules  |
| <b>GEOTECHNICS</b>                       | I.S. EN 16907-2:2018     | Earthworks - Part 2: Classification of materials   |
| <b>GEOTECHNICS</b>                       | I.S. EN 16907-3:2018     | Earthworks - Part 3: Construction procedures   |
| <b>GEOTECHNICS</b>                       | I.S. EN 16907-4:2018     | Earthworks - Part 4: Soil treatment with lime and/or hydraulic binders   |
| <b>GEOTECHNICS</b>                       | I.S. EN 16907-5:2018     | Earthworks - Part 5: Quality control   |
| <b>GEOTECHNICS</b>                       | I.S. EN 16907-6:2018     | Earthworks - Part 6: Land reclamation earthworks using dredged hydraulic fill  |
| <b>GEOTECHNICS</b>                       | I.S. EN ISO 14688-1:2018 | Geotechnical investigation and testing - Identification and classification of soil - Part 1: Identification and description (ISO 14688-1:2017)                         |
| <b>GEOTECHNICS</b>                       | I.S. EN ISO 14688-2:2018 | Geotechnical investigation and testing - Identification and classification of soil - Part 2: Principles for a classification (ISO 14688-2:2017)                        |
| <b>GEOTECHNICS</b>                       | I.S. EN ISO 14689:2018   | Geotechnical investigation and testing - Identification, description and classification of rock (ISO 14689:2017)   |
| <b>GEOTECHNICS</b>                       | I.S. EN ISO 17892-7:2018 | Geotechnical investigation and testing - Laboratory testing of soil - Part 7: Unconfined compression test (ISO 17892-7:2017)   |

| Sector Description  | Reference                 | Title_NSAI   |
|---|---------------------------|--|
| <b>GEOTECHNICS</b>  | I.S. EN ISO 17892-8:2018  | Geotechnical investigation and testing - Laboratory testing of soil - Part 8: Unconsolidated undrained triaxial test (ISO 17892-8:2018)  |
| <b>GEOTECHNICS</b>  | I.S. EN ISO 17892-9:2018  | Geotechnical investigation and testing - Laboratory testing of soil - Part 9: Consolidated triaxial compression tests on water saturated soils (ISO 17892-9:2018)                  |
| <b>GEOTECHNICS</b>  | I.S. EN ISO 17892-12:2018 | Geotechnical investigation and testing - Laboratory testing of soil - Part 12: Determination of liquid and plastic limits (ISO 17892-12:2018)                                      |
| <b>GEOTECHNICS</b>  | I.S. EN ISO 22476-6:2018  | Geotechnical investigation and testing - Field testing - Part 6: Self boring pressuremeter test (ISO 22476-6:2018)   |
| <b>GEOTECHNICS</b>  | I.S. EN ISO 22476-8:2018  | Geotechnical investigation and testing - Field testing - Part 8: Full displacement pressuremeter test (ISO 22476-8:2018)   |
| <b>GEOTECHNICS</b>  | I.S. EN ISO 22477-4:2018  | Geotechnical investigation and testing - Testing of geotechnical structures - Part 4: Testing of piles: dynamic load testing (ISO 22477-4:2018)                                    |
| <b>GEOTECHNICS</b>  | I.S. EN ISO 22477-5:2018  | Geotechnical investigation and testing - Testing of geotechnical structures - Part 5: Testing of grouted anchors (ISO 22477-5:2018)  |
| <b>HEAT PUMPS</b>   | I.S. EN 14511-1:2018      | Air conditioners, liquid chilling packages and heat pumps for space heating and cooling and process chillers, with electrically driven compressors - Part 1: Terms and definitions |
| <b>HEAT PUMPS</b>   | I.S. EN 14511-2:2018      | Air conditioners, liquid chilling packages and heat pumps for space heating and cooling and process chillers, with electrically driven compressors - Part 2: Test conditions       |
| <b>HEAT PUMPS</b>   | I.S. EN 14511-3:2018      | Air conditioners, liquid chilling packages and heat pumps for space heating and cooling and process chillers, with electrically driven compressors - Part 3: Test methods          |
| <b>HEAT PUMPS</b>   | I.S. EN 14511-4:2018      | Air conditioners, liquid chilling packages and heat pumps for space heating and cooling and process chillers, with electrically driven compressors - Part 4: Requirements          |
| <b>INFORMATION TECHNOLOGY EQUIPMENT AND AUDIO, VIDEO AND AUDIO-VISUAL EQUIPMENT AND SYSTEMS</b> | I.S. EN 50174-2:2018      | Information technology - Cabling installation - Part 2: Installation planning and practices inside buildings   |
| <b>LIFTS &amp; ESCALATORS</b>   | I.S. EN 81-21:2018        | Safety rules for the construction and installation of lifts - Lifts for the transport of persons and goods - Part 21: New passenger and goods passenger lifts in existing building |

| Sector Description  | Reference                | Title_NSAI   |
|---|--------------------------|--|
| <b>LIFTS &amp; ESCALATORS</b>                                 | I.S. EN 81-28:2018       | Safety rules for the construction and installation of lifts - Lifts for the transport of persons and goods - Part 28: Remote alarm on passenger and goods passenger lifts                                    |
| <b>LIFTS &amp; ESCALATORS</b>                                 | I.S. EN 81-58:2018       | Safety rules for the construction and installation of lifts - Examination and tests - Part 58: Landing doors fire resistance test  |
| <b>LIFTS &amp; ESCALATORS</b>                                 | I.S. EN 81-70:2018       | Safety rules for the construction and installation of lifts - Particular applications for passenger and goods passenger lift - Part 70: Accessibility to lifts for persons including persons with disability |
| <b>LIFTS &amp; ESCALATORS</b>                                 | I.S. EN 81-71:2018       | Safety rules for the construction and installation of lifts - Particular applications to passenger lifts and goods passenger lifts - Part 71: Vandal resistant lifts   |
| <b>LIFTS &amp; ESCALATORS</b>                                 | I.S. EN 81-77:2018       | Safety rules for the construction and installations of lifts - Particular applications for passenger and goods passenger lifts - Part 77: Lifts subject to seismic conditions                                |
| <b>LIFTS &amp; ESCALATORS</b>                                 | I.S. EN 16719:2018       | Transport platforms  |
| <b>LIGHTING EQUIPMENT AND LIGHTING APPLICATION TECHNOLOGY</b> | I.S. EN 12193:2018       | Light and lighting - Sports lighting   |
| <b>LIGHTING EQUIPMENT AND LIGHTING APPLICATION TECHNOLOGY</b> | I.S. EN 12665:2018       | Light and lighting - Basic terms and criteria for specifying lighting requirements   |
| <b>LIGHTING EQUIPMENT AND LIGHTING APPLICATION TECHNOLOGY</b> | I.S. EN 13032-5:2018     | Light and lighting - Measurement and presentation of photometric data of lamps and luminaires - Part 5: Presentation of data for luminaires used for road lighting   |
| <b>LIGHTNING PROTECTION</b>                                   | I.S. EN IEC 62561-2:2018 | Lightning protection system components (LPSC) - Part 2: Requirements for conductors and earth electrodes   |
| <b>LIGHTNING PROTECTION</b>                                   | I.S. EN IEC 62561-6:2018 | Lightning protection system components (LPSC) - Part 6: Requirements for lightning strike counters (LSC)   |
| <b>LIGHTNING PROTECTION</b>                                   | I.S. EN IEC 62561-7:2018 | Lightning protection system components (LPSC) - Part 7: Requirements for earthing enhancing compounds  |
| <b>LIGHTNING PROTECTION</b>                                   | I.S. EN IEC 62793:2018   | Protection against lightning - Thunderstorm warning systems  |

| Sector Description                        | Reference                | Title_NSAI  |
|---|--------------------------|---|
| <b>MASONRY</b>                            | I.S. EN 16954:2018       | Agglomerated stone - Slabs and cut-to-size products for flooring and stairs (internal and external)   |
| <b>MEASURING INSTRUMENTS</b>              | I.S. EN 12261:2018       | Gas meters - Turbine gas meters   |
| <b>MEASURING INSTRUMENTS</b>              | I.S. EN 12405-1:2018     | Gas meters - Conversion devices - Part 1: Volume conversion   |
| <b>MEASURING INSTRUMENTS</b>              | I.S. EN 12480:2018       | Gas meters - Rotary displacement gas meters   |
| <b>MEASURING INSTRUMENTS</b>              | I.S. EN 13757-2:2018     | Communication systems for meters - Part 2: Wired M-Bus communication  |
| <b>MEASURING INSTRUMENTS</b>              | I.S. EN 13757-3:2018     | Communication systems for meters - Part 3: Application protocols  |
| <b>MEASURING INSTRUMENTS</b>              | I.S. EN 14236:2018       | Ultrasonic domestic gas meters  |
| <b>MEASURING INSTRUMENTS</b>              | S.R. CEN/TR 17167:2018   | Communication system for meters - Accompanying TR to EN 13757-2,-3 and -7, Examples and supplementary information   |
| <b>METAL STRUCTURES</b>                   | I.S. EN 1090-2:2018      | Execution of steel structures and aluminium structures - Part 2: Technical requirements for steel structures  |
| <b>METAL STRUCTURES</b>                   | I.S. EN 1090-4:2018      | Execution of steel structures and aluminium structures - Part 4: Technical requirements for cold-formed structural steel elements and cold-formed structures for roof, ceiling, floor and wall applications |
| <b>NON-ELECTRIC COOKERS AND BARBECUES</b> | I.S. EN 16510-1:2018     | Residential solid fuel burning appliances - Part 1: General requirements and test methods   |
| <b>PAINTS AND RELATED PRODUCTS</b>        | I.S. EN ISO 12944-1:2017 | Paints and varnishes - Corrosion protection of steel structures by protective paint systems - Part 1: General introduction (ISO 12944-1:2017)   |
| <b>PAINTS AND RELATED PRODUCTS</b>        | I.S. EN ISO 12944-2:2017 | Paints and varnishes - Corrosion protection of steel structures by protective paint systems - Part 2: Classification of environments (ISO 12944-2:2017)   |
| <b>PAINTS AND RELATED PRODUCTS</b>        | I.S. EN ISO 12944-3:2017 | Paints and varnishes - Corrosion protection of steel structures by protective paint systems - Part 3: Design considerations (ISO 12944-3:2017)  |

| Sector Description                 | Reference                | Title_NSAI  |
|------------------------------------|--------------------------|---|
| <b>PAINTS AND RELATED PRODUCTS</b> | I.S. EN ISO 12944-4:2017 | Paints and varnishes - Corrosion protection of steel structures by protective paint systems - Part 4: Types of surface and surface preparation (ISO 12944-4:2017)   |
| <b>PETROLEUM PRODUCTS</b>          | I.S. EN 1431:2018        | Bitumen and bituminous binders - Determination of residual binder and oil distillate from bitumen emulsions by distillation   |
| <b>PETROLEUM PRODUCTS</b>          | I.S. EN 13302:2018       | Bitumen and bituminous binders - Determination of dynamic viscosity of bituminous binder using a rotating spindle apparatus   |
| <b>PETROLEUM PRODUCTS</b>          | I.S. EN 13589:2018       | Bitumen and bituminous binders - Determination of the tensile properties of modified bitumen by the force ductility method  |
| <b>PETROLEUM PRODUCTS</b>          | I.S. EN 13702:2018       | Bitumen and bituminous binders - Determination of dynamic viscosity of bitumen and bituminous binders by the cone and plate method  |
| <b>PLASTICS PIPES</b>              | I.S. EN 1852-1:2018      | Plastics piping systems for non-pressure underground drainage and sewerage - Polypropylene (PP) - Part 1: Specifications for pipes, fittings and the system   |
| <b>PLASTICS PIPES</b>              | I.S. EN 13476-1:2018     | Plastics piping systems for non-pressure underground drainage and sewerage - Structured-wall piping systems of unplasticized poly(vinyl chloride) (PVC-U), polypropylene (PP) and polyethylene (PE) - Part 1: General requirements and performance characteristics  |
| <b>PLASTICS PIPES</b>              | I.S. EN 13476-2:2018     | Plastics piping systems for non-pressure underground drainage and sewerage - Structured-wall piping systems of unplasticized poly(vinyl chloride) (PVC-U), polypropylene (PP) and polyethylene (PE) - Part 2: Specifications for pipes and fittings with smooth internal and external surface and the system, Type A          |
| <b>PLASTICS PIPES</b>              | I.S. EN 13476-3:2018     | Plastics piping systems for non-pressure underground drainage and sewerage - Structured-wall piping systems of unplasticized poly(vinyl chloride) (PVC-U), polypropylene (PP) and polyethylene (PE) - Part 3: Specifications for pipes and fittings with smooth internal and profiled external surface and the system, Type B |
| <b>PLASTICS PIPES</b>              | I.S. EN ISO 11296-1:2018 | Plastics piping systems for renovation of underground non-pressure drainage and sewerage networks - Part 1: General (ISO 11296-1:2018)  |
| <b>PLASTICS PIPES</b>              | I.S. EN ISO 11296-2:2018 | Plastics piping systems for renovation of underground non-pressure drainage and sewerage networks - Part 2: Lining with continuous pipes (ISO 11296-2:2018)   |
| <b>PLASTICS PIPES</b>              | I.S. EN ISO 11296-3:2018 | Plastics piping systems for renovation of underground non-pressure drainage and sewerage networks - Part 3: Lining with close-fit pipes (ISO 11296-3:2018)  |
| <b>PLASTICS PIPES</b>              | I.S. EN ISO 11296-4:2018 | Plastics piping systems for renovation of underground non-pressure drainage and sewerage networks - Part 4: Lining with cured-in-place pipes (ISO 11296-4:2018)   |

| Sector Description | Reference                        | Title_NSAI   |
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| PLASTICS PIPES     | I.S. EN ISO 11297-1:2018         | Plastics piping systems for renovation of underground drainage and sewerage networks under pressure - Part 1: General (ISO 11297-1:2018)   |
| PLASTICS PIPES     | I.S. EN ISO 11297-2:2018         | Plastics piping systems for renovation of underground drainage and sewerage networks under pressure - Part 2: Lining with continuous pipes (ISO 11297-2:2018)                                      |
| PLASTICS PIPES     | I.S. EN ISO 11297-3:2018         | Plastics piping systems for renovation of underground drainage and sewerage networks under pressure - Part 3: Lining with close-fit pipes (ISO 11297-3:2018)                                       |
| PLASTICS PIPES     | I.S. EN ISO 11297-4:2018         | Plastics piping systems for renovation of underground drainage and sewerage networks under pressure - Part 4: Lining with cured-in-place pipes (ISO 11297-4:2018)                                  |
| PLASTICS PIPES     | I.S. EN ISO 11298-1:2018         | Plastics piping systems for renovation of underground water supply networks - Part 1: General (ISO 11298-1:2018)   |
| PLASTICS PIPES     | I.S. EN ISO 11298-2:2018         | Plastics piping systems for renovation of underground water supply networks - Part 2: Lining with continuous pipes (ISO 11298-2:2018)  |
| PLASTICS PIPES     | I.S. EN ISO 11298-3:2018         | Plastics piping systems for renovation of underground water supply networks - Part 3: Lining with close-fit pipes (ISO 11298-3:2018)   |
| PLASTICS PIPES     | I.S. EN ISO 13056:2018           | Plastics piping systems - Pressure systems for hot and cold water - Test method for leaktightness under vacuum (ISO 13056:2011)  |
| PLASTICS PIPES     | I.S. EN ISO 13259:2018           | Thermoplastics piping systems for underground non-pressure applications - Test method for leaktightness of elastomeric sealing ring type joints (ISO 13259:2018)                                   |
| PLASTICS PIPES     | I.S. EN ISO 15874-2:2013/A1:2018 | Plastics piping systems for hot and cold water installations - Polypropylene (PP) - Part 2: Pipes - Amendment 1 (ISO 15874-2:2013/Amd 1:2018)  |
| PLASTICS PIPES     | I.S. EN ISO 15874-3:2013/A1:2018 | Plastics piping systems for hot and cold water installations - Polypropylene (PP) - Part 3: Fittings - Amendment 1 (ISO 15874-3:2013/Amd 1:2018)   |
| PLASTICS PIPES     | I.S. EN ISO 15874-5:2013/A1:2018 | Plastics piping systems for hot and cold water installations - Polypropylene (PP) - Part 5: Fitness for purpose of the system - Amendment 1 (ISO 15874-5:2013/Amd 1:2018)                          |
| PLASTICS PIPES     | I.S. EN ISO 21225-1:2018         | Plastics piping systems for the trenchless replacement of underground pipeline networks - Part 1: Replacement on the line by pipe bursting and pipe extraction (ISO 21225-1:2018)                  |
| PLASTICS PIPES     | I.S. EN ISO 21225-2:2018         | Plastics piping systems for the trenchless replacement of underground pipeline networks - Part 2: Replacement off the line by horizontal directional drilling and impact moling (ISO 21225-2:2018) |

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| <b>PLASTICS PIPES</b>                | S.R. CEN/TS 1329-2:2018 | Plastics piping systems for soil and waste discharge (low and high temperature) within the building structure - Unplasticized poly(vinyl chloride) (PVC-U) - Part 2: Guidance for the assessment of conformity |
| <b>PRECAST CONCRETE PRODUCTS</b>     | I.S. EN 13369:2018      | Common rules for precast concrete products   |
| <b>ROAD BUILDING AND MAINTENANCE</b> | I.S. EN 12274-1:2018    | Slurry surfacing - Test methods - Part 1: Sampling of slurry surfacing mixture   |
| <b>ROAD BUILDING AND MAINTENANCE</b> | I.S. EN 12274-2:2018    | Slurry surfacing - Test methods - Part 2: Determination of residual binder content including preparation of samples  |
| <b>ROAD BUILDING AND MAINTENANCE</b> | I.S. EN 12274-3:2018    | Slurry surfacing - Test methods - Part 3: Consistency  |
| <b>ROAD BUILDING AND MAINTENANCE</b> | I.S. EN 12274-4:2018    | Slurry surfacing - Test methods - Part 4: Determination of cohesion of the mix   |
| <b>ROAD BUILDING AND MAINTENANCE</b> | I.S. EN 12274-5:2018    | Slurry surfacing - Test method - Part 5: Determination of the minimum binder content and wearing resistance  |
| <b>ROAD BUILDING AND MAINTENANCE</b> | I.S. EN 12274-6:2018    | Slurry surfacing - Test methods - Part 6: Rate of application  |
| <b>ROAD BUILDING AND MAINTENANCE</b> | I.S. EN 12697-12:2018   | Bituminous mixtures - Test methods - Part 12: Determination of the water sensitivity of bituminous specimens   |
| <b>ROAD BUILDING AND MAINTENANCE</b> | I.S. EN 12697-24:2018   | Bituminous mixtures - Test methods - Part 24: Resistance to fatigue  |
| <b>ROAD BUILDING AND MAINTENANCE</b> | I.S. EN 12697-26:2018   | Bituminous mixtures - Test methods - Part 26: Stiffness  |
| <b>ROAD BUILDING AND MAINTENANCE</b> | I.S. EN 13285:2018      | Unbound mixtures - Specifications  |
| <b>ROAD BUILDING AND MAINTENANCE</b> | I.S. EN 13880-10:2018   | Hot applied joint sealants - Part 10: Test method for the determination of adhesion and cohesion following continuous extension and compression  |
| <b>ROAD BUILDING AND MAINTENANCE</b> | I.S. EN 13880-13:2018   | Hot applied joint sealants - Part 13: Test method for the determination of the discontinuous extension (adherence test)  |

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| <b>ROAD BUILDING AND MAINTENANCE</b> | S.R. CEN/TS 12697-50:2018 | Bituminous mixtures - Test methods - Part 50: Resistance to scuffing   |
| <b>ROAD SAFETY</b>                   | I.S. EN 1436:2018         | Road marking materials - Road marking performance for road users and test methods  |
| <b>ROAD SAFETY</b>                   | I.S. EN 1793-2:2018       | Road traffic noise reducing devices - Test method for determining the acoustic performance - Part 2: Intrinsic characteristics of airborne sound insulation under diffuse sound field conditions                 |
| <b>ROAD SAFETY</b>                   | I.S. EN 1793-6:2018       | Road traffic noise reducing devices - Test method for determining the acoustic performance - Part 6: Intrinsic characteristics - In situ values of airborne sound insulation under direct sound field conditions |
| <b>ROAD SAFETY</b>                   | I.S. EN 1794-1:2018       | Road traffic noise reducing devices - Non-acoustic performance - Part 1: Mechanical performance and stability requirements   |
| <b>SANITARY APPLIANCES</b>           | I.S. EN 997:2018          | WC pans and WC suites with integral trap   |
| <b>SANITARY APPLIANCES</b>           | I.S. EN 14055:2018        | WC and urinal flushing cisterns  |
| <b>SANITARY APPLIANCES</b>           | S.R. CEN/TR 17221:2018    | Guidance on the application of CE marking and preparation of Declaration of Performance for sanitary appliances  |
| <b>SOLAR ENERGY</b>                  | I.S. EN 12977-1:2018      | Thermal solar systems and components - Custom built systems - Part 1: General requirements for solar water heaters and combisystems  |
| <b>SOLAR ENERGY</b>                  | I.S. EN 12977-2:2018      | Thermal solar systems and components - Custom built systems - Part 2: Test methods for solar water heaters and combisystems  |
| <b>SOLAR ENERGY</b>                  | I.S. EN 12977-3:2018      | Thermal solar systems and components - Custom built systems - Part 3: Performance test methods for solar water heater stores   |
| <b>SOLAR ENERGY</b>                  | I.S. EN 12977-4:2018      | Thermal solar systems and components - Custom built systems - Part 4: Performance test methods for solar combistores   |
| <b>STRUCTURES</b>                    | I.S. EN 1992-4:2018       | Eurocode 2 - Design of concrete structures - Part 4: Design of fastenings for use in concrete  |
| <b>STRUCTURES</b>                    | I.S. EN 15129:2018        | Anti-seismic devices   |



| Sector Description  | Reference              | Title_NSAI  |
|---|------------------------|---|
| <b>STRUCTURES</b>   | S.R. CEN/TR 17079:2018 | Design of fastenings for use in concrete - Redundant non-structural systems   |
| <b>STRUCTURES</b>   | S.R. CEN/TR 17080:2018 | Design of fastenings for use in concrete - Anchor channels - Supplementary rules  |
| <b>STRUCTURES</b>   | S.R. CEN/TR 17081:2018 | Design of fastenings for use in concrete - Plastic design of fastenings with headed and post-installed fasteners  |
| <b>STRUCTURES</b>   | S.R. CEN/TR 17231:2018 | Eurocode 1: Actions on Structures - Traffic Loads on Bridges - Track-Bridge Interaction   |
| <b>SURFACE TRANSPORT<br/>ELECTROTECHNICAL<br/>SYSTEMS</b> | I.S. EN 50556:2018     | Road traffic signal systems   |
| <b>TEXTILES</b>   | I.S. EN 13361:2018     | Geosynthetic barriers - Characteristics required for use in the construction of reservoirs and dams   |
| <b>TEXTILES</b>   | I.S. EN 13362:2018     | Geosynthetic Barriers - Characteristics required for use in the construction of canals  |
| <b>TEXTILES</b>   | I.S. EN 13491:2018     | Geosynthetic barriers - Characteristics required for use in the construction of tunnels and associated underground structures   |
| <b>TEXTILES</b>   | I.S. EN 13492:2018     | Geosynthetic barriers - Characteristics required for use in the construction of liquid waste disposal sites, transfer stations or secondary containment   |
| <b>TEXTILES</b>   | I.S. EN 13493:2018     | Geosynthetic barriers - Characteristics required for use in the construction of solid waste storage and disposal sites  |
| <b>TEXTILES</b>   | I.S. EN 15382:2018     | Geosynthetic barriers - Characteristics required for use in transportation infrastructure   |
| <b>TEXTILES</b>   | I.S. EN 16993:2018     | Geosynthetic barriers - Characteristics required for use in the construction of storage lagoons, secondary containment (above and below ground) and other containment applications for chemicals, polluted water and produced liquids |
| <b>TEXTILES</b>   | I.S. EN 16994:2018     | Clay Geosynthetic Barriers - Characteristics required for use in the construction of underground structures (other than tunnels and associated structures)  |

| Sector Description                   | Reference              | Title_NSAI  |
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| <b>THERMAL MATTERS</b>               | I.S. EN 13467:2018     | Thermal insulating products for building equipment and industrial installations - Determination of dimensions, squareness and linearity of preformed pipe insulation  |
| <b>THERMAL MATTERS</b>               | I.S. EN 13497:2018     | Thermal insulation products for building applications - Determination of the resistance to impact of external thermal insulation composite systems (ETICS)  |
| <b>THERMAL MATTERS</b>               | I.S. EN 14064-1:2018   | Thermal insulation products for buildings - In-situ formed loose-fill mineral wool (MW) products - Part 1: Specification for the loose-fill products before installation  |
| <b>THERMAL MATTERS</b>               | I.S. EN 17101:2018     | Thermal insulation products for buildings - Methods of identification and test methods for one-component PU adhesive foam for External Thermal Insulation Composite Systems (ETICS)   |
| <b>TRAM- AND RAILWAY ENGINEERING</b> | I.S. EN 13231-5:2018   | Railway applications - Track - Acceptance of works - Part 5: Procedures for rail reprofiling in plain line, switches, crossings and expansion devices   |
| <b>TRAM- AND RAILWAY ENGINEERING</b> | I.S. EN 14587-1:2018   | Railway applications - Infrastructure - Flash butt welding of new rails - Part 1: R220, R260, R260Mn, R320Cr, R350HT, R350LHT, R370CrHT and R400HT grade rails in a fixed plant   |
| <b>TRAM- AND RAILWAY ENGINEERING</b> | I.S. EN 16727-1:2018   | Railway applications - Track - Noise barriers and related devices acting on airborne sound propagation - Non-acoustic performance - Part 1: Mechanical performance under static loadings - Calculation and test method                    |
| <b>TRAM- AND RAILWAY ENGINEERING</b> | I.S. EN 16727-2-1:2018 | Railway applications - Track - Noise barriers and related devices acting on airborne sound propagation - Non-acoustic performance - Part 2-1: Mechanical performance under dynamic loadings due to passing trains - Resistance to fatigue |
| <b>TRAM- AND RAILWAY ENGINEERING</b> | I.S. EN 16729-3:2018   | Railway applications - Infrastructure - Non-destructive testing on rails in track - Part 3: Requirements for identifying internal and surface rail defects  |
| <b>TRAM- AND RAILWAY ENGINEERING</b> | I.S. EN 16951-1:2018   | Railway applications - Track - Noise barriers and related devices acting on airborne sound propagation - Procedures for assessing long term performance - Part 1: Acoustic characteristics  |
| <b>TRAM- AND RAILWAY ENGINEERING</b> | I.S. EN 16951-2:2018   | Railway applications - Track - Noise barriers and related devices acting on airborne sound propagation - Procedures for assessing long term performance - Part 2: Non-acoustic characteristics  |
| <b>WATERPROOFING MATERIALS</b>       | I.S. EN 12691:2018     | Flexible sheets for waterproofing - Bitumen, plastic and rubber sheets for roof waterproofing - Determination of resistance to impact   |

| Sector Description             | Reference   | Title_NSAI  |
|--------------------------------|---|---|
| <b>WATERPROOFING MATERIALS</b> | I.S. EN 17190:2018  | Flexible sheets for waterproofing - Solar Reflectance Index |
| <b>KEY:</b>                    |   |   |
| I.S.                           | Irish Standard  |   |
| I.S. EN                        | Irish Standard - NSAI adopted European Norm   |   |
| I.S. EN ISO                    | Irish Standard - ISO (International Standards Organisation) standard adopted by CEN as a European Norm adopted by NSAI      |   |
| I.S. EN IEC                    | Irish Standard – IEC (International Electrotechnical Commission) standard adopted by CEN as a European Norm adopted by NSAI |   |
| S.R.                           | Standard Recommendation   |   |
| S.R. CEN/TS                    | CEN Technical Specification adopted by NSAI as a Standard Recommendation  |   |
| S.R. CEN/TR                    | CEN Technical Report adopted by NSAI as a Standard Recommendation   |   |