

SKH

Nieuwe Kanaal 9c, 6709 PA Wageningen, the Netherlands
Postbus 159, 6700 AD Wageningen, the Netherlands
Telephone: +31 (0) 317 45 34 25
E-mail: mail@skh.nl
Website: http://www.skh.nl

**PLYWOOD FOR USE IN CONSTRUCTION
(STRUCTURAL AND NON-STRUCTURAL)
AND OTHER APPLICATIONS**

Number: 33227/18
Issued: 01-09-2018
Supersedes: 33227/17

Producer

Factories

Latvijas Finieris AS
Bauskas street 59
LV-1004 RIGA
LATVIA

Tel. +37 167 06 72 07
Fax +37 167 06 73 26
E-mail: info@finieris.lv
Website: http://www.finieris.com

1) Furniers
Bauskas street 59
RIGA, LATVIA

2) Hapaks
Finiera street 2
RIGA, LATVIA

3) Lignums
Finiera street 6
RIGA, LATVIA

Declaration of SKH

This attest-with-product certificate has been issued on the basis of AD 1705 'Plywood' dd. 09-12-2016, in accordance with the SKH Regulations for Certification.

The quality system and product characteristics associated with the plywood for use in construction (structural and non-structural) and other applications are assessed periodically.

Based on this, SKH declares that:

- There is legitimate confidence that the plywood produced by the producer upon delivery meets:
 - the technical specification established in this attest-with-product certificate;
 - the product requirements stated in the AD.

Provided that the plywood features the KOMO[®] mark in a manner as indicated in this attest-with-product certificate.

- The building elements assembled from this plywood provide the performance as included in this attest-with-product certificate and these building elements meet the Building Act requirements included in this attest-with-product certificate, providing:
 - the technical specification and applications conditions defined in this attest-with-product certificate are met;
 - the production of the building elements occurs in accordance with the conditions and/or processing methods stipulated in this attest-with-product certificate.

The essential characteristics, as stipulated in the applicable European standard, form no part of this attest-with-product certificate.

In the context of this attest-with-product certificate, no inspection of the manufacture of the building elements assembled from this plywood takes place, neither of its composition nor of the assembly into building elements.

For SKH


drs. H.J.O. van Doorn, director

This attest-with-product certificate is also included in the overview on the website of the KOMO foundation:
<http://www.komo.nl>

Users of this attest-with-product certificate are advised to verify whether this certificate is still valid; consult the website:
<http://www.skh.nl>

This attest-with-product certificate consists of 7 pages.

Consult the Dutch version in case of doubt.



Building Act

The following has been assessed:

- Quality system
- Product
- One-off performance in the application
- Periodic check

BUILDING ELEMENTS ASSEMBLED FROM PLYWOOD FOR STRUCTURAL AND NON-STRUCTURAL APPLICATIONS

1 TECHNICAL SPECIFICATION

This attest-with-product certificate concerns the product certification of plywood for use in construction (structural and non-structural) and other applications.

2 MARKING

Each sheet of plywood shall be marked with the KOMO[®]-mark

The execution of this mark is as follows:

- word mark KOMO[®] or logo;
- attest-with-product certificate number 33227;
- nominal thickness in mm;
- class according to AD 1705;
- if the plywood has been coated by the plywood producer, the letter 'P' shall be added to the indication of product class (see section 4.4 of the AD 1705 plywood);
- if an overlay has been applied to the plywood by the plywood producer, the letter 'O' shall be added to the indication of product class (see section 4.5 of the AD 1705 plywood).



Location of the mark: clearly visible on each sheet of plywood supplied.

3 PERFORMANCE BASED ON THE BUILDING ACT

BUILDING ACT ENTRY (ONLY FOR BUILDING PURPOSES)

No.	Section	Limiting value/ method of determination	Performance according to quality declaration
2.1	General strength of the building construction	Ultimate threshold building construction, calculation according NEN-EN 1995-1-1 (including national annex), NEN-EN 1990 (including national annex) and NEN-EN 1991-1-1/3/4/5 (including national annex)	No performance mentioned
2.9	Restriction of development of fire and smoke	Indoor surface	at least fire class D and at least smoke class s2
		Outdoor surface	At least fire class D
		Walkable surface	At least fire class D _f and at least smoke class s1 _f
		Part of construction	No performance mentioned
3.9	Restriction of the presence of harmful substances and ionising radiation	According to Ministerial regulation	No performance mentioned

* = optional

3.1 PERFORMANCE FROM A SAFETY VIEWPOINT

GENERAL STRENGTH OF THE BUILDING STRUCTURE; BA Section 2.1
 (Only for structural applications)

3.1.1 Strength of the building structure; BA Articles 2.2, 2.3 and 2.4

The ultimate limiting condition of the building structure must be calculated in accordance with NEN-EN 1995-1-1 (incl. national appendix) in combination with the loads and load combinations described in NEN-EN 1990 (incl. national appendix) and NEN-EN 1991-1-1/3/4/5 (incl. national appendix). In this, for the determination of the performance of the plywood, use is made of the characteristic values of the mechanical properties of the Plywood mentioned in the declaration of performance.

BUILDING ELEMENTS ASSEMBLED FROM PLYWOOD FOR STRUCTURAL AND NON-STRUCTURAL APPLICATIONS

LIMITING THE DEVELOPMENT OF FIRE AND SMOKE; BA Section 2.9

3.1.2 Indoor surface; BA Article 2.67

In application bordering on the indoor air in structural elements (such as walls and ceilings), BA Article 2.67 distinguishes among 'extra-protected escape route', 'protected escape route' and 'other':

Extra-protected escape route

Plywood may not be used bordering on the indoor air in structural elements (such as walls and ceilings).

Protected escape route

Plywood of 9 mm and thicker may be used bordering on the indoor air in structural elements (such as walls and ceilings) in the following usage functions:

- Other residential function
- Other meeting function
- Other healthcare function
- Other industrial function
- Office function
- Educational function
- Sports function
- Retail function
- Other usage function

Other

Plywood of 9 mm and thicker may be used bordering on the indoor air in structural elements (such as walls and ceilings) in the following usage functions:

- Residential function
- Meeting function
- Healthcare function
- Other industrial function
- Office function
- Accommodation function
- Educational function
- Sports function
- Retail function
- Other usage function

Application conditions

Plywood thinner than 9 mm may not be used bordering on the indoor air in structural elements (such as walls and ceilings).

BUILDING ELEMENTS ASSEMBLED FROM PLYWOOD FOR STRUCTURAL AND NON-STRUCTURAL APPLICATIONS

3.1.3

Outdoor surface; BA Article 2.68

In application bordering on the outdoor air in structural elements (such as walls), BA Article 2.68 distinguishes among 'extra-protected escape route', 'protected escape route' and 'other':

Extra-protected escape route

Plywood may not be used bordering on the outdoor air in structural elements (such as walls).

Protected escape route

Plywood of 9 mm and thicker may be used bordering on the outdoor air in that part of structural elements (such as walls) that is not situated higher than 13 m in the following usage function:

- Other residential function

Plywood of 9 mm and thicker may be used bordering on the outdoor air in that part of structural elements (such as walls) that is not situated higher than 13 m, with the exception of the part from the adjacent site to a height of at least 2.5 m of a structure of which a floor intended for people lies at least 5 m above the measurement level, in the following usage functions:

- Other meeting function
- Other healthcare function
- Industrial function
- Office function
- Educational function
- Sports function
- Retail function
- Other usage function

Other

Plywood of 9 mm and thicker may be used bordering on the outdoor air in that part of structural elements (such as walls) that is not situated higher than 13 m in the following usage function:

- Other residential function

Plywood of 9 mm and thicker may be used bordering on the outdoor air in that part of structural elements (such as walls) that is not situated higher than 13 m, with the exception of the part from the adjacent site to a height of at least 2.5 m of a structure of which a floor intended for people lies at least 5 m above the measurement level, in the following usage functions:

- Residential function in a residential building
- Residential function for care with a UA greater than 500 m²
- Meeting function
- Cell function
- Healthcare function
- Industrial function
- Office function
- Accommodation function
- Educational function
- Sports function
- Retail function
- Other usage function

Application conditions

Plywood thinner than 9 mm may not be used bordering on the outside air in structural elements (such as walls).

BUILDING ELEMENTS ASSEMBLED FROM PLYWOOD FOR STRUCTURAL AND NON-STRUCTURAL APPLICATIONS

3.1.4 Walkable surface; BA Article 2.69

In application for the upper surface of a floor, a stair or an access ramp, BA Article 2.69 distinguishes among 'extra-protected escape route', 'protected escape route' and 'other':

Extra-protected escape route

Plywood may not be used for the upper surface of a floor, a stair or an access ramp.

Protected escape route

Plywood of 9 mm and thicker may be used for the upper surface of a floor, a stair or an access ramp in the following usage functions:

- Other residential function
- Meeting function
- Healthcare function
- Industrial function
- Office function
- Accommodation function
- Educational function
- Sports function
- Retail function
- Other usage function

Other

Plywood of 9 mm and thicker may be used for the upper surface of a floor, a stair or an access ramp in the following usage functions:

- Residential function
- Meeting function
- Healthcare function
- Industrial function
- Office function
- Accommodation function
- Educational function
- Sports function
- Retail function
- Other usage function

Application conditions

Plywood thinner than 9 mm may not be used for the upper surface of a floor, a stair or an access ramp.

3.2 PERFORMANCE FROM A HEALTH VIEWPOINT

REDUCING THE PRESENCE OF HARMFUL SUBSTANCES AND IONISING RADIATION;
BA Section 3.9

3.2.1 Ministerial regulations; BA Article 3.63

The Plywood shall at least meet class E1.

BUILDING ELEMENTS ASSEMBLED FROM PLYWOOD FOR STRUCTURAL AND NON-STRUCTURAL APPLICATIONS

4 PRODUCT PROPERTIES

The plywood meets the product requirements stipulated in AD 1705 'Plywood'. The statements in the attest part for building elements assembled from Plywood for structural and non-structural applications are valid providing the Plywood meets the conditions below:

Property	Determination method	AD requirement
Characteristic values of the mechanical properties*	NEN-EN 310	No requirement
Limiting the development of fire and smoke	NEN-EN 13501-1 or derived from Table 8 in NEN-EN 13986	Inside surface fire class at least D and smoke class at least s2. Outside surface fire class at least D. Walkable surface fire class at least D _f and smoke class at least s1 _f .
Restriction on the use of harmful materials	NEN-EN 13986 Annex B	At least E1

* = optional

4.1 Further specifics and properties

Table 1 Standard characteristics of various types of plywood

Type	Thickness (mm)	KOMO class	Glue type	Timber species
Riga Ply	9-40	4	PF	Birch
Riga Prime*	9-40	3	PF	Birch
Riga Pre-Prime	9-40	3	PF	Birch

* coated panels that are placed on the market by the producer, of which the plywood base panel is KOMO certified but the applied coating is not.

Table 2 Special characteristics of various types of plywood

Type	Overlaid *	Primer * (AD 0814)	Pre-varnish * (AD 0817)	Composite plywood	Composite material
Riga Ply	No	No	No	No	No
Riga Prime*	No	No	No	No	No
Riga Pre-Prime	Yes	No	No	No	No

* = overlays and coatings on plywood are only a part of this KOMO certificate if the plywood panels are marked accordingly section 2 and if the product is mentioned as such in the table above.

Table 3 Composition of the plywood

Type of sheet	Thickness in mm	Number of layers (minimum)
Birch	9	7
	12	9
	15	11
	18	13
	21	15
	24	17
	27	19
	30	21
	35	25
	40	29

BUILDING ELEMENTS ASSEMBLED FROM PLYWOOD FOR STRUCTURAL AND NON-STRUCTURAL APPLICATIONS

5 PROCESSING INSTRUCTIONS

- 5.1 **Transport and storage**
Dry storage without direct floor contact.

6 SUGGESTIONS FOR THE USER

6.1 General

- in the context of this attest-with-product certificate, no check takes place on the correctness of the performance of the essential properties;
- the statements in this attest-with-product certificate may not be used as replacement for the CE marking and/or the associated mandatory Performance Declaration.

6.2 On delivery of the Plywood inspect whether:

- the Plywood meets the specification and application conditions included in this attest-with-product certificate;
- what has been delivered corresponds with what has been agreed;
- the products do not show any visible defects as a result of transport, etc.;
- processing and/or maintenance instructions are available.

If the products are rejected on the basis of the above, contact shall be made with:
Latvijas Finieris AS and if desirable: The certification-body SKH.

6.2 Attest-with-product certificate

It is the duty of the producer to make sure that the buyer receives a copy of the complete attest-with-product certificate.

6.3 Application and use

Transport, storage and processing are to be carried out in accordance with the conditions included in this attest-with-product certificate.

6.4 Period of validity

Consult the website: <http://www.skh.nl> to verify whether the attest-with-product certificate is still valid.

LICENSED SKH BA-CONNECTION DOCUMENT

BUILDING ELEMENTS ASSEMBLED WITH WOOD-BASED PANELS

Producer	Factory	Number:	33227/18-BB
Latvijas Finieris AS	1) Furniers	Issued:	01-09-2018
Bauskas street 59	Bauskas street 59	Valid till:	09-12-2022
LV-1004 RIGA	RIGA, LATVIA	Supersedes:	33227/17-BB
LATVIA			
Tel. +37 167 06 72 07	2) Hapaks		
Fax +37 167 06 73 26	Finiera street 2		
E-mail: info@finieris.lv	RIGA, LATVIA		
Website: http://www.finieris.com			

Declaration of SKH

This BA-connection document is issued on the basis of SKH Directive Connection Building Act 7517 'Building elements assembled with wood-based panels' dd. 13-07-2016, in accordance with the SKH Regulations for Certification.


The connection of the building elements assembled with wood-based panels type plywood to the Building Act has been assessed and the principles for the assessment are reassessed periodically.

Based on this, SKH declares that the building elements assembled with wood-based panels type plywood comply with the requirements of the Building Act included in this BA-connection document, provided that:

- the technical specifications and application conditions defined in this BA-connection document are met;
- the production of the building elements assembled with wood-based panels type plywood is carried out according to the conditions and/or processing methods stipulated in this BA-connection document.

In the context of this Licensed BA-connection document, no inspection of the manufacture of the wood-based panels type plywood takes place, neither of its composition and/or the assembly into building elements.

This BA-connection document is a licensed quality declaration for the Building Act 2012 according to the Tripartite Agreement in 2015 (Official Gazette (Staatscourant) 8987, 2015) and the Housing Act. This BA-connection document is included in the 'Overview of licensed quality declarations for the building industry' on the website of the Foundation for Building Quality (Stichting Bouwkwiteit: www.bouwkwiteit.nl).



drs. H.J.O van Doorn, director



Users of this BA-connection document are advised to verify its validity; consult the SKH-website: <http://www.skh.nl>.
This BA-connection document consists of: 6 pages.
Consult the Dutch version in case of doubt.

1 INTRODUCTION

This BA-connection document provides the connection for building elements assembled with wood-based panels according to 'SKH Directive 7517 connection Building Act for building elements assembled with wood-based panels' to the Dutch Building Act.

It concerns the plywood of Latvijas Finieris AS.

This BA-connection document is prepared by SKH, which is accredited by the Dutch Council for Accreditation as certification body for the 'SKH Directive 7517 connection Building Act for building elements assembled with wood-based panels'.

This document is valid only, when the wood-based panels type plywood are implemented and applied according to the conditions set out in this connection document. As a licensed quality declaration according to Building Act article 1.11, this connection document provides sufficient evidence for the customer that the wood-based panels type plywood used in building elements comply with the requirements of the Building Act in their application.

This connection document is made up of two parts. The first part deals with the connection to the Building Act. The second part, in the form of an Annex, deals with the technical specification and further specification of the applicable conditions for application and processing guidelines.

2 SUGGESTIONS FOR THE USER

Upon delivery of the plywood, inspect whether:

- the plywood comply with the specification and conditions for application as included in this BA-connection document;
- the material delivered is as agreed upon;
- the products are free of visible defects as a results of transport, handling and such;
- processing guidelines and/or maintenance requirements are available.

In case the materials are rejected based on (one of) the points mentioned above, Latvijas Finieris AS should be contacted and if desirable, the certification body SKH.

3 PERFORMANCE BASED ON THE BUILDING ACT**BUILDING ACT ENTRY (ONLY FOR BUILDING PURPOSES)**

No.	Section	Limiting value/ method of determination	Performance according to quality declaration
2.1	General strength of the building construction*	Ultimate threshold building construction, calculation according NEN-EN 1995-1-1 (including national annex), NEN-EN 1990 (including national annex) and NEN-EN 1991-1-1/3/4/5 (including national annex)	No performance mentioned
2.9	Restriction of development of fire and smoke	Indoor surface	Complies with Building Act
		Outdoor surface*	Optional mention of compliance with Building Act
		Walkable surface	Complies with Building Act
		Part of construction	No performance mentioned
3.9	Restriction of the presence of harmful substances and ionising radiation	According to Ministerial regulations	No performance mentioned

* optional

3.1 PERFORMANCE FROM A SAFETY VIEWPOINT

GENERAL STRENGTH OF THE BUILDING STRUCTURE; BA Section 2.1

3.1.1 Strength of the building structure; BA Articles 2.2, and 2.4

The ultimate limiting condition of the building structure must be calculated in accordance with NEN-EN 1995-1-1 (incl. national appendix) in combination with the loads and load combinations described in NEN-EN 1990 (incl. national appendix) and NEN-EN 1991-1-1/3/4 (incl. national appendix). In this, for the determination of the performance of the plywood, the characteristic values of the mechanical properties of the plywood are used.

Application examples

Siding, façade elements and general carpentry.

LIMITING THE DEVELOPMENT OF FIRE AND SMOKE; BA Section 2.9

3.1.2 Indoor surface; BA Article 2.67

When applied in structural elements adjacent to the indoor air (such as walls and ceilings), BA Article 2.67 distinguishes among 'extra-protected escape route', 'protected escape route' and 'other':

Extra-protected escape route

Plywood may not be used in structural elements adjacent to the indoor air (such as walls and ceilings).

Protected escape route

Plywood of 9 mm and thicker may be used in structural elements adjacent to the indoor air (such as walls and ceilings) in the following usage functions:

- Other residential function
- Other meeting function
- Other healthcare function
- Other industrial function
- Office function
- Educational function
- Sports function
- Retail function
- Other usage function

Other

Plywood of 9 mm and thicker may be used in structural elements adjacent to the indoor air (such as walls and ceilings) in the following usage functions:

- Residential function
- Meeting function
- Healthcare function
- Other industrial function
- Office function
- Accommodation function
- Educational function
- Sports function
- Retail function
- Other usage function

Application conditions

Plywood with a thickness less than 9 mm may not be used in structural elements adjacent to the indoor air (such as walls and ceilings).

3.1.3 Outdoor surface; BA Article 2.68

When applied in structural elements adjacent to the outdoor air (such as walls), BA Article 2.68 distinguishes among 'extra-protected escape route', 'protected escape route' and 'other':

Extra-protected escape route

Plywood may not be used in structural elements adjacent to the outdoor air (such as walls).

Protected escape route

Plywood of 9 mm and thicker may be used in that part of structural elements (such as walls) adjacent to the outdoor air, which is situated not higher than 13 m in the following usage function:

- Other residential function

Plywood of 9 mm and thicker may be used in that part of structural elements (such as walls) adjacent to the outdoor air, which is not situated higher than 13 m, with the exception of the part from the adjacent terrain to a height of at least 2.5 m of a structure of which a floor intended for people lies at least 5 m above the measurement level, in the following usage functions:

- Other meeting function
- Other healthcare function
- Industrial function
- Office function
- Educational function
- Sports function
- Retail function
- Other usage function

Other

Plywood of 9 mm and thicker may be used in that part of structural elements (such as walls) adjacent to the outdoor air, which is situated not higher than 13 m in the following usage function:

- Other residential function

Plywood of 9 mm and thicker may be used in that part of structural elements (such as walls) adjacent to the outdoor air, which is not situated higher than 13 m, with the exception of the part from the adjacent terrain to a height of at least 2.5 m of a structure of which a floor intended for people lies at least 5 m above the measurement level, in the following usage functions:

- Residential function in a residential building
- Residential function for care with a UA greater than 500 m²
- Meeting function
- Cell function
- Healthcare function
- Industrial function
- Office function
- Accommodation function
- Educational function
- Sports function
- Retail function
- Other usage function

Application conditions

Plywood with a thickness less than 9 mm may not be used in structural elements adjacent to the outdoor air (such as walls).

3.1.4 Walkable surface; BA Article 2.69

When applied for the upper surface of a floor, stairs or an access ramp, BA Article 2.69 distinguishes among 'extra-protected escape route', 'protected escape route' and 'other':

Extra-protected escape route

Plywood may not be used for the upper surface of a floor, stairs or an access ramp.

Protected escape route

Plywood of 9 mm and thicker may be used for the upper surface of a floor, stairs or an access ramp in the following usage functions:

- Other residential function
- Meeting function
- Healthcare function
- Industrial function
- Office function
- Accommodation function
- Educational function
- Sports function
- Retail function
- Other usage function

Other

Plywood of 9 mm and thicker may be used for the upper surface of a floor, stairs or an access ramp in the following usage functions:

- Residential function
- Meeting function
- Healthcare function
- Industrial function
- Office function
- Accommodation function
- Educational function
- Sports function
- Retail function
- Other usage function

Application conditions

Plywood with a thickness less than 9 mm may not be used for the upper surface of a floor, stairs or an access ramp.

REDUCING THE PRESENCE OF HARMFUL SUBSTANCES AND IONISING RADIATION;
BA Section 3.9

3.1.5 Ministerial regulations; BA Article 3.63

The plywood shall at least meet the requirements of class E1.

4 BUILDING ACT

The statements in this connection document are based on the following version of the Building Act:

Bouwbesluit 2012 Stb. 2011 416, 676; Stb. 2012, 125, 256, 441, 643; Stb.2013, 75, 244, 462; Stb. 2014, 51, 211, 232, 233; 333, 342, 358, 539; Stb 2015, 92, 249, 425; Stb. 2016, 383, 384; Stb. 2017, 268, 494 en de Ministeriële Regelingen Stcrt. 2011, 23914; Stcrt. 2012, 13245 Stcrt. 2013, 5457, 16919; Stcrt. 2014, 4057, 34076, 37003; Stcrt. 2015, 17338, 45221; Stcrt. 2016, 33491, 71548; Stcrt. 2017, 73470

Annex A: technical specification and conditions for application

A.1 TECHNICAL SPECIFICATION

The statements in this licensed BA-connection document are based on the plywood as described in this technical specification. The statements are not valid for plywood which that deviate from this specification.

A.1.1 Characteristics of plywood

The connection to the Building Act, elaborated in this declaration, is based on the following characteristics of the plywood, as declared by the supplier:

Characteristic	Basis for connection
Restriction of development of fire and smoke	The plywood have a fire class of at least D, D _{f1} and smoke class of at least s2, s1 _{f1} according to NEN-EN 13501-1 with plywood with a thickness of 9 mm or thicker. For plywood with a thickness of less than 9 mm, fire class F applies and is therefore not suitable for use in construction.
Reducing the presence of harmful substances	The plywood comply with the requirements of at least class E1 according to NEN-EN 13986 Annex B

With regard to the essential characteristics as described in Annex ZA of the harmonised European standard the values should be used, which are included in the declaration of performance of the specific manufacturer. Mention of the characteristics above is only to express the underlying principles for making the connection to the Building Act. Essential characteristics are not part of the declaration of this BA-connection document.

A.1.2 Product specification

Table 1 Standard characteristics of various types of plywood

Type	Thickness (mm)	KOMO class	Glue type	Timber species
Riga Ply	9-40	4	PF	Birch
Riga Pre-Prime	9-40	3	PF	Birch

Table 2 Special characteristics of various types of plywood

Type	Overlaid	Primer	Pre-varnish	Composite plywood	Composite material
Riga Ply	No	No	No	No	No
Riga Pre-Prime	Yes	No	No	No	No

Table 3 Composition of the plywood

Type of sheet	Thickness in mm	Number of layers (minimum)
Birch	9	7
	12	9
	15	11
	18	13
	21	15
	24	17
	27	19
	30	21
	35	25
	40	29

A.2 PROCESSING GUIDELINES / CONDITIONS FOR APPLICATION

The plywood producer is obliged to supply application instruction in relation to the certified plywood, or refer to a document that is publicly available (e.g. on the producers website).