DECLARATION OF PERFORMANCE (according EU 305/2011, Annex V)

Reference number **03-0001-04**

Identification code of the product type
STEICOultralam

Name and address of the manufacturer
STEICO SE, Otto-Lilienthal-Ring 30, D-85622 Feldkirchen, Deutschland, Email: info@steico.com

Name and address of the authorised representative
not relevant

Product type	Intended use	AVCP*	Notified Body reference	Notified Test Institute
Structural laminated veneer lumber	Buildings and bridges	1	Materialprüfungsanstalt der Universität Stuttgart MPA Stuttgart – Otto-Graf-Institut (FMPA) Postfach 80 11 40 70511 Stuttgart / Germany	No 0672
***Assessment and verification of constancy of performance system according to Annex V of regulation (EU) No 305/2011**				

Declared performance

Essential characteristics		Unit	Test and evaluation method	STEICO ultralam R	STEICO ultralam Rs	STEICO ultralam X		STEICO ultralam I	Harmonized technical specification
						19 ≤ t ≤ 21	24 ≤ t ≤ 75		
Bonding quality		%	4.2	≥70	≥70	≥70	≥70	≥70	EN 14374:2004
Bending strength edgewise	$f_{m,0,edge,k}$	N/mm²	4.4.2	48	55	30	34	30	
Size effect parameter	s		4.4.2	0,15	0,15	0,15	0,15	0,15	
Bending strength flatwise parallel to the grain	$f_{m,0,flat,k}$	N/mm²	4.4.3	50	52	34	38	35	
Bending strength flatwise perpendicular to the grain	$f_{m,90,flat,k}$	N/mm²	4.4.3	NPD	NPD	9	12	NPD	
Tension strength parallel to the grain	$f_{t,0,k}$	N/mm²	4.4.4	36	42	18	24	NPD	
Tension strength perpendicular to the grain, edgewise	$f_{t,90,edge,k}$	N/mm²	4.4.5	0,9	0,9	5	5	NPD	
Tension strength perpendicular to the grain, flatwise	$f_{t,90,flat,k}$	N/mm²	4.4.5	NPD	NPD	NPD	NPD	NPD	
Compression strength parallel to the grain	$f_{c,0,k}$	N/mm²	4.4.6	40	56	26	34	38	
Compression strength perpendicular to the grain, edgewise	$f_{c,90,edge,k}$	N/mm²	4.4.7	7,5	8,6	9	9	7,5	
Compression strength perpendicular to the grain, flatwise	$f_{c,90,flat,k}$	N/mm²	4.4.7	3,8	3,8	4,2	4,2	3,8	

Declared performance (continued)

Essential characteristics		Unit	Test and evaluation method	STEICO ultralam R	STEICO ultralam Rs	STEICO ultralam X		STEICO ultralam I	Harmonized technical specification
						19 ≤ t ≤ 21	24 ≤ t ≤ 75		
Shear strength related to edgewise bending	$f_{v,edge,k}$	N/mm²	4.4.8	4,6	5,2	4,6	4,6	3,4	EN 14374:2004
Shear strength related to flatwise bending	$f_{v,flat,k}$	N/mm²	4.4.9	3,2	3,2	2,7	2,7	3,2	
Modulus of elasticity parallel to the grain	$E_{0,mean}$	N/mm²	4.5.2	14000	15600	10000	10600	11200	
Modulus of elasticity parallel to the grain	$E_{0,05}$	N/mm²	4.5.2	12000	14000	9000	9000	10000	
Modulus of elasticity perpendicular to the grain, flatwise	$E_{90,flat,mean}$	N/mm²	4.5.3	NPD	NPD	2300	3000	NPD	
Shear modulus related to edgewise bending	$G_{mean,edge}$	N/mm²	4.5.4	500	500	550	550	NPD	
Shear modulus related to flatwise bending	$G_{mean,flat}$	N/mm²	4.5.5	500	500	550	550	NPD	
Density (5%-quantile)	ρ_k	kg/m³	4.6	480	550	480	480	430	
Reaction to fire		-	4.8	D-s1, d0	D-s1, d0	D-s1, d0	D-s1, d0	D-s1, d0	
Release of formaldehyde		-	4.9	E 1	E 1	E 1	E 1	E 1	
Natural durability against biological attack		-	4.10	4	4	4	4	4	

The performance of the product identified is in conformity with the declared performance.
This declaration of performance is issued under the sole responsibility of the manufacturer identified above.

Signed for and on behalf of the manufacturer by:

Dr. Michael Makas Head of R&D / QM (name and function)	Feldkirchen, 26/11/2013 (place and date of issue)	b.o. (signature)

Date: 25/06/2013	Revised: 26/11/2013