



Light Emission Distribution Laboratory

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Accredited for Compliance with ISO/IEC 17025 - Testing.
Accreditation No. 19541

PHOTOMETRIC TEST REPORT No. 200139PH

Date: 4th February 2020

Client: OFFSPRING PROFILES

Address: 40 Austin Street, Onekawa, Napier, New Zealand

Contact: Robin Campbell

Luminaire: Flat Freddie 35 & Downhill Dan 35

Catalogue No. FF35-SUPER-26-40 (sample tested) & DD35-SUPER-26-40

Description: 520mm aluminium extrusion (48mm x 35mm) incorporating a flat linear opal diffuser. This test report covers both model numbers as their optical openings are identical.

Optical System: Offspring Profiles 24V dc LED board type Super Series-26W-4000K (500mm LED strip)

Control Gear: LISUN DC Series DC3010 24VDC Supply.

Test Specification:

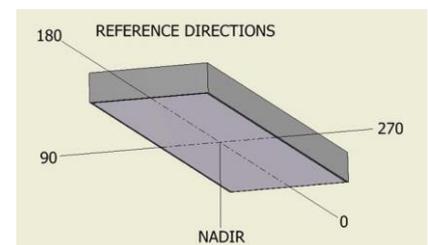
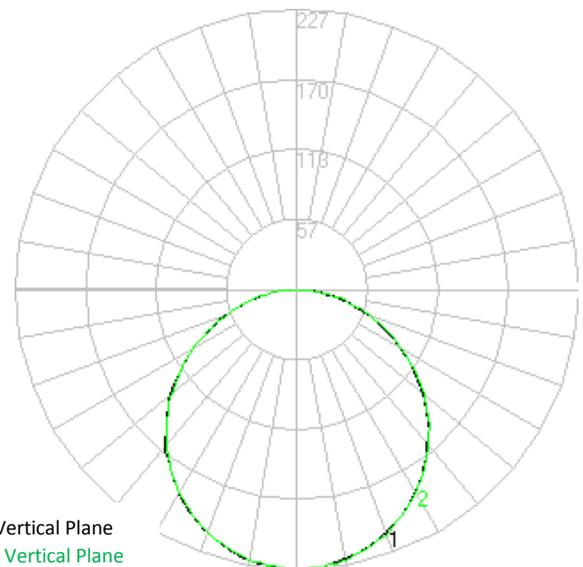
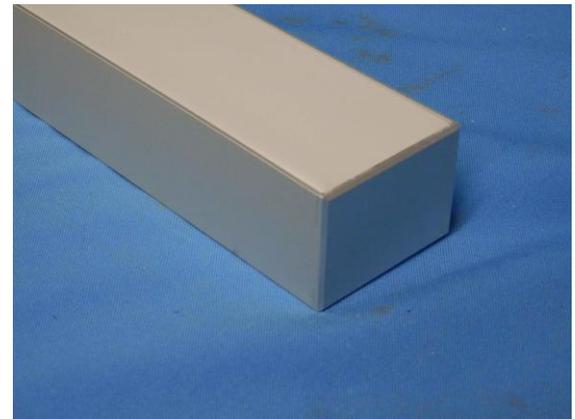
The luminaire was tested in accordance with the procedures given in IES LM79-19, "Optical and electrical measurements of Solid-State Lighting Products" using the **absolute** method.

Results:

When tested at an ambient of 25°C at a supply voltage of 24.0VDC, the luminaire consumed 0.549A and 13.2W. That is, Lamp Circuit Power (LCP), which includes power supply losses, is 13.2W.

The Total Luminous Flux was measured as 640 Lumens. The Correlated Colour Temperature was measured as 4126K average.

Luminous Intensity Distribution (I-TABLE) is given on Page 5



Tested by: Bruce Real/J King on 4th of February 2020

Authorised Signatory: _____
D.Ford

The tests and measurements performed at LEDLab and covered by this document are traceable to Australian National standards of measurement. This report only applies to the items tested as received from the client and shall only be reproduced in full unless approved in writing by Light Emission Distribution Laboratory. The data specified in this report apply to the luminaire with the components nominated and will not necessarily be applicable to the use of other light source sizes or ratings, nor to any other luminaire of similar design. The data are based on operation of the luminaire under laboratory conditions. Multiplying factors to correct the data for actual working conditions should be used when applicable. Ph. 0403242121



Test Configuration

The luminaire was photometered in IESNA Horizontal – Vertical Reference angles such that:

- The luminaire was mounted with photometric centre aligned with photometric zero (in the direction of nadir), centred on the light emitting area.
- The supply wires were located on the 0° Horizontal angle, photometric horizontal, in the zero-degree photometric plane.
- In accordance with CIE S 025/E:2015 Clause 5.3.2 the face of the diffuser was co-incident with centre of the goniophotometer.
- The long dimension of the optical opening in the direction of the H= 0° - 180° Plane.
- The photometric test distance of 9.82m, is referenced to the photometric centre of the luminaire and the photocell.

Due to the Type B mounting arrangement, a correction factor to achieve correct orientation was determined but not applied as it was less than 0.5% and accounted for in the Uncertainty Budget. Should these Uncertainties be required contact LEDLab.

Test Procedures and Equipment

Calibration report: 181104CAL using N.M.I. report RN 181690 on standard lamp M14192

Technical Procedure: P113 & P118

Angular Resolution: Test Configuration and issued .ies file
C Plane Interval 15 Deg
Gamma Angle Interval 1.0 Deg
Abbreviated Test Report File (I-Table)
C Plane Interval 15 Deg
Gamma Angle Interval 5.0 Deg

Software: Lisun LSG-1800B

Obstructions: None

Lab. Book Page: PH3/1695

Primary Orientation Correction: 1.0

Colour correction: 1.028

Goniophotometer: Lisun Electronics Model LSG-1800B, Serial No. GSGHF070010.

Photocell: Lisun Electronics Detector Serial No. 330220-1

Lux meter: Lisun Electronics Model PM 400, Serial No. GSRXK090021

Lux meter integration time (PLC): 5

Power meter: Lisun Electronics Model RT-200, Serial No. GSXY0100021

Power meter integration time (s): 0.5

Luminaire thermometer: AMA 1362983 0.1°C Serial No 526,10942

Temperature Data Logger: Lisun TMP-8 Multiplex Serial No GSJWM010028

Auxiliary Photocell: Delta Ohm HD 2102.1 & LP471PHOT

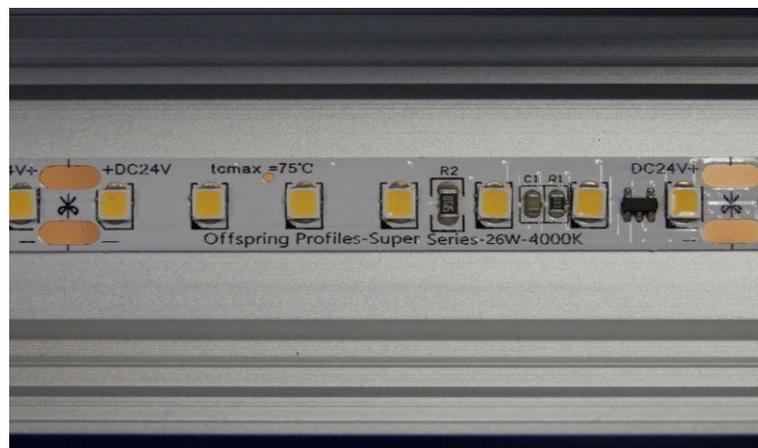
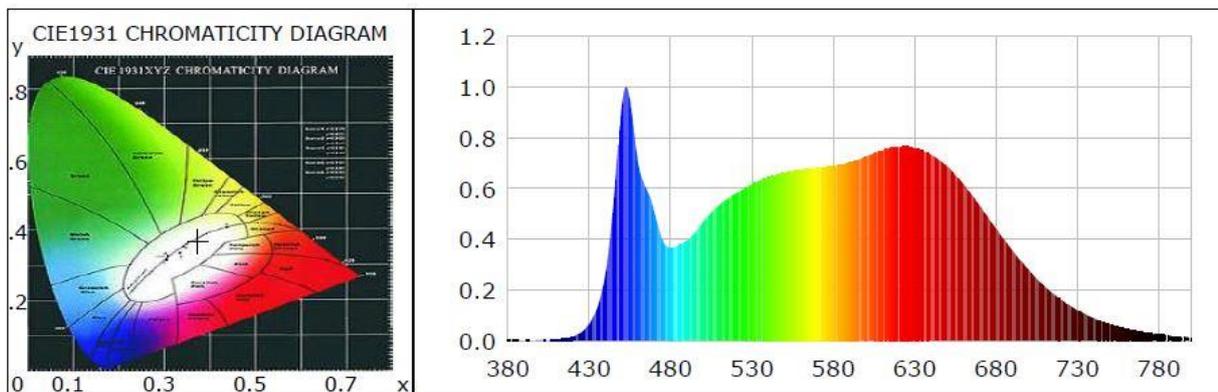
TEST REPORT and IES file archive

The data files for this report are contained in the archive file 200139PH.zip

IES file 200139PH.ies Document File: 200139PH.pdf

CIE Colorimetric Parameters

Chromaticity coordinates: $x=0.3740$ $y=0.3693$ $u(u')=0.2239$ $v=0.3315$ $v'=0.4973$
 CCT: $T_c=4126K$ ($duv=-0.00163$) Color Ratio: $R=0.199$ $G=0.754$ $B=0.047$
 Peak Wavelength: 453nm Half Bandwidth: 26.0nm
 Dominant Wavelength: 579.6nm Color Purity: 0.231
 CRI: $R_i: R_a=96.1$
 R1 =97 R2 =99 R3 =97 R4 =96 R5 =96 R6 =95 R7 =96 R8 =94
 R9 =86 R10=95 R11=96 R12=72 R13=99 R14=98 R15=96





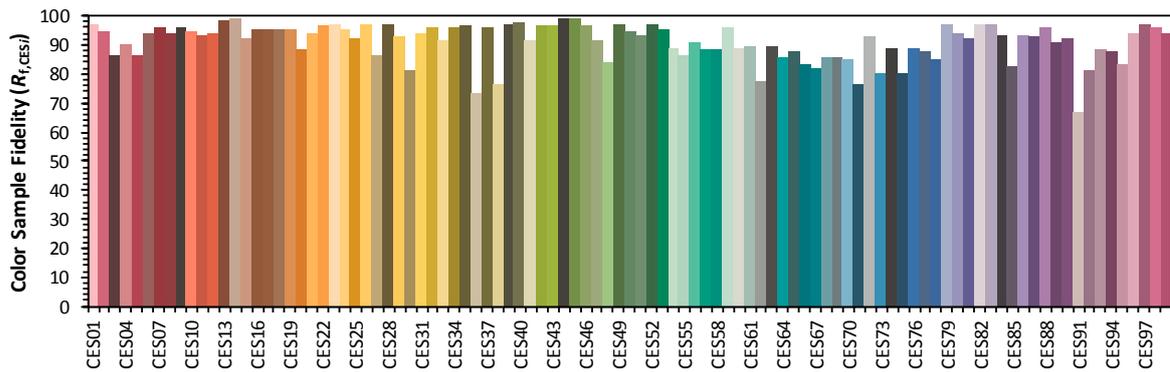
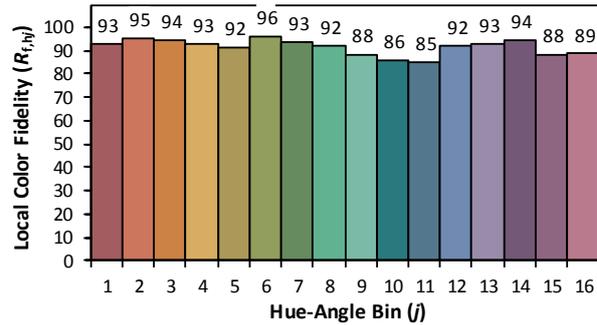
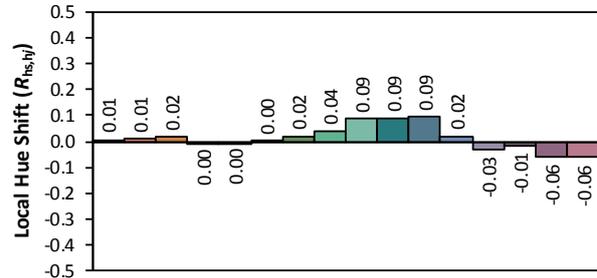
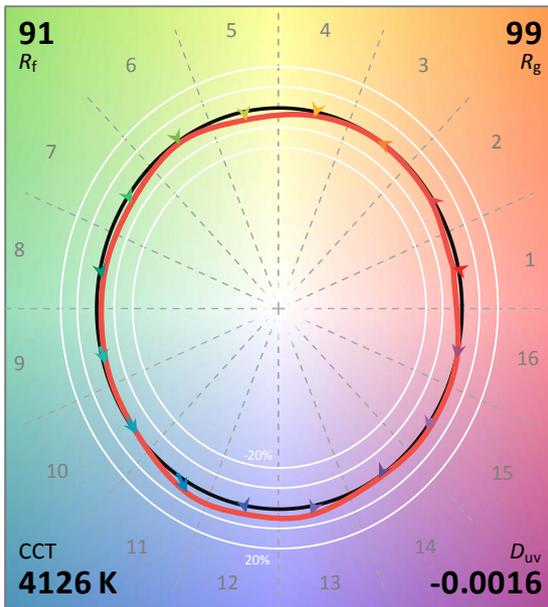
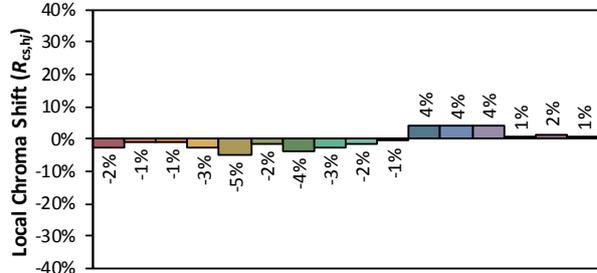
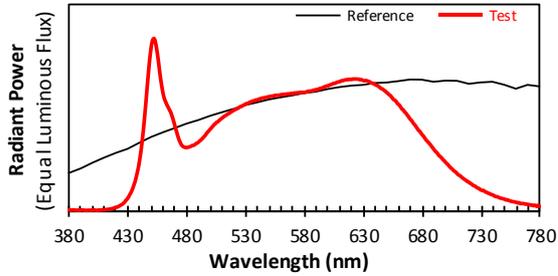
ANSI/IES TM-30-18 Color Rendition Report

Source: 26W-4000K (500mm LED strip)

Manufacturer: OFFSPRING PROFILES

Date: 4/02/2020

Model: FF35 -SUPER-26-40 (JA19004160S)



Notes: This is a recommended method for displaying ANSI/IES TM-30-18 information.

x 0.3740
 y 0.3693
 u' 0.2239
 v' 0.4973

CIE 13.3-1995 (CRI)	
R_a	96
R_g	87

Colors are for visual orientation purposes only. Created with the ANSI/IES TM-30-18 Calculator Version 2.00.



LUMINOUS INTENSITY DISTRIBUTION (I-Table) - cd																									
Vertical Angle (V) Degrees	Horizontal Angle (H Plane) - Degrees																								
	0	15	30	45	60	75	90	105	120	135	150	165	180	195	210	225	240	255	270	285	300	315	330	345	360
0	227	227	227	227	227	227	227	227	227	227	227	227	227	227	227	227	227	227	227	227	227	227	227	227	227
5	226	226	226	225	226	226	226	225	226	225	226	226	226	226	226	226	226	226	225	226	225	226	225	225	226
10	222	222	222	222	223	222	223	223	223	223	223	223	223	223	222	223	222	223	222	222	222	222	222	222	222
15	217	217	217	217	217	217	218	217	218	217	218	217	218	217	218	217	217	217	217	217	217	217	216	217	217
20	210	210	210	210	210	210	210	210	210	210	211	211	210	211	210	210	210	210	210	210	210	210	209	210	210
25	201	201	201	201	201	201	201	201	202	201	202	201	201	202	201	202	201	201	201	201	200	201	200	201	201
30	190	190	190	190	191	190	191	190	191	191	192	191	190	191	191	191	190	190	190	190	189	190	189	190	190
35	178	177	178	177	178	177	178	178	178	179	178	178	178	178	178	179	178	178	177	178	177	177	177	177	178
40	163	163	163	163	163	163	164	164	165	164	165	166	166	166	163	165	163	163	163	163	163	163	163	163	163
45	149	149	150	148	150	150	149	149	150	150	152	150	149	149	150	150	150	150	148	150	149	150	148	149	149
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70	60	60	61	61	62	62	62	62	63	62	62	62	60	61	61	62	61	62	60	61	61	61	59	60	60
75	42	42	43	43	44	44	44	44	45	44	44	44	42	43	43	44	43	44	43	43	43	43	41	43	42
80	25	25	26	26	27	26	27	27	28	27	27	27	25	26	25	27	26	27	26	26	25	26	24	25	25
85	10	9	10	10	10	11	11	11	12	12	11	11	10	10	10	10	10	10	10	10	10	9	10	10	
90	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0
95	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0
100	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0
105	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0
110	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0
115	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0
120	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0
125	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0
130	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0
135	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0
140	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0
145	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0
150	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0
155	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0
160	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0
165	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0
170	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0
175	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0
180	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0