

UGRA

Display Analysis & Certification Tool

Report

Basics

Date: 2022-8-21 18:18:29
Report-Version: v2.0.0
Monitor-Name: \\.\DISPLAY1
EDID-Name: UltraFine Pro
EDID-Serial: 204NTEPAZ172
Profile: C:/.../UltraFine_Pro-2022-08-21T181143-5800K-18-100%-trc.icm
Created: 2022-8-21 18:11
Measurement device: i1Pro, Rev. 3, Serial: 1107951
Evaluation method: UDACT v2.0

Summary

Calibration (Reference Whitepoint: 5800.00 Kelvin)

White Point	yes
Gray balance	yes
Tone values	yes
Profile quality	yes
Gamut ability	yes



**The monitor has
passed the certification
according to the UDACT v2.0
specifications.**

Softproof quality (depends on the calibration verification)

ISO Coated v2 (FOGRA39L)	yes
sRGB	yes
AdobeRGB	yes
ECI-RGB v2.0	yes

Diagram



Whitepoint

The whitepoint should be as close as possible to the black body curve and the calibration target. The maximum allowed distance to the target whitepoint is 2.0 dE00.

XYZ (measured):	156.60 164.36 160.11
XYZ (normalized):	95.28 100.00 97.42
xy:	0.3255 0.3417
Luminance:	164.4 Cd/m2
Next Temperature:	5810 Kelvin
Reference Whitepoint:	5800.0 Kelvin
Deviation XYZ to Reference Whitepoint:	0.3 dE00
	0.2 dE76

Blackpoint

The blackpoint is not defined in ISO 12646. Therefore UDACT does only measure but not assess it.

Luminance:	-0.0 Cd/m2
Chromaticity:	0.5 Chroma (Lab)

Gray balance

Average and maximum calculation will respect measurements with 1% minimum luminance only. The L-deviation shows the difference between the profile and measurement value.

The maximum allowed deviations to comply with this test are an average of 1.0 DeltaC, a range of 2.0 DeltaC. A maximum L-deviation of 2.3 dL00 in the luminance range of 20%-100% shall not be exceeded.

%	Kelvin	Cd/m2	L	Chroma	Gamma	Delta-L
0	0	-0.00	-0.01	0.50		
5	6459	0.42	2.32	0.94	1.95	-1.4
10	5713	2.42	12.45	0.27	1.83	-0.3
15	5795	5.08	20.40	0.89	1.84	-0.6
20	5779	8.92	27.91	0.80	1.82	-0.2
25	5727	12.89	33.65	0.68	1.83	-0.5
30	5759	18.43	39.93	0.43	1.82	-0.2
35	5760	24.47	45.48	0.47	1.82	-0.2
40	5738	30.92	50.47	0.75	1.82	-0.5
45	5760	38.49	55.50	0.42	1.82	-0.0
50	5831	46.47	60.13	0.62	1.83	-0.2
55	5792	55.68	64.86	0.18	1.81	-0.1
60	5794	65.28	69.27	0.18	1.81	-0.1
65	5854	74.76	73.21	0.54	1.83	-0.1
70	5790	86.13	77.52	0.18	1.81	+0.0
75	5809	97.68	81.53	0.18	1.81	+0.0
80	5773	109.97	85.46	0.45	1.81	-0.0
85	5785	122.14	89.07	0.41	1.84	+0.1
90	5778	135.59	92.79	0.59	1.86	+0.0
95	5776	149.89	96.49	0.58	1.86	+0.1
100	5810	164.36	100.00	0.00		
Average	5783			0.44	1.83	0.1
Max				0.80		0.5
Range				1.56		

Tone values

This tests checks the calibration curves (vcgt) of the graphic card. Through the calibration of a display tone values can be lost. A display for the printing industry should show at least 95% of the incoming tone values.



Tone values = 97.9%

Profile Quality

This test displays and measures RGB values and compares them with the transformation of the profile. The maximum allowed deviations to comply with this test are an average of 2.0 dE00 and a maximum of 4.0 dE00.

The Lab values are calculated, based on the measured white point (xy: 0.3255 0.3417).

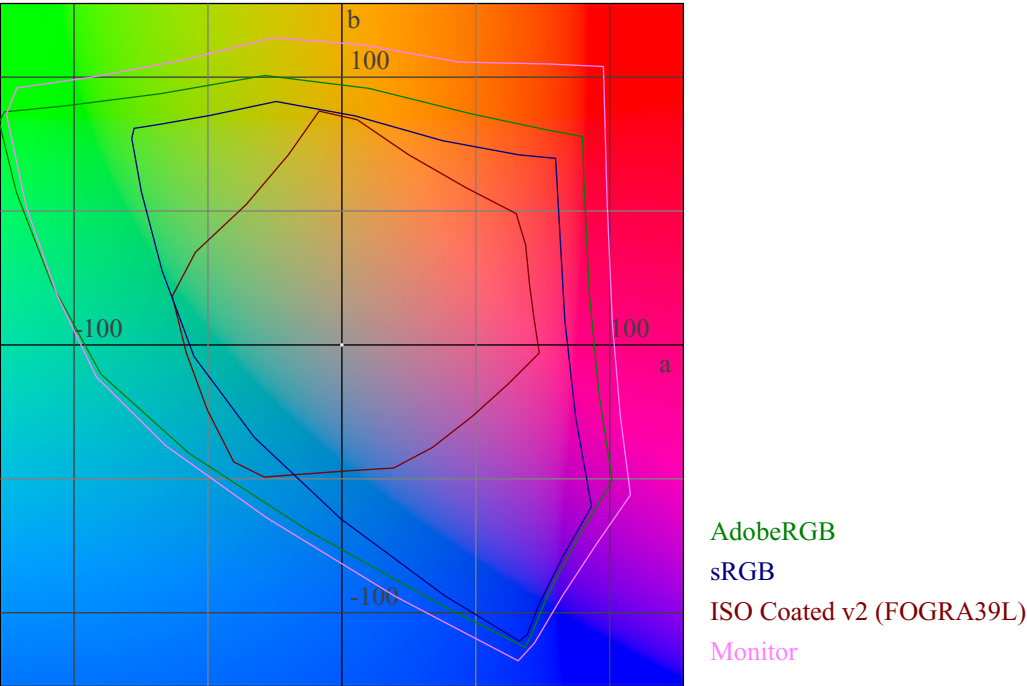
The assumed chromatic adaptation is: Bradford

RGB	Lab	deltaLab	dE76	dE00
0 0 0	-0.0 -0.3 0.4	0.0 0.3 -0.4	0.5	0.6
0 0 128	13.3 43.9 -78.0	0.0 1.2 -1.0	1.5	0.3
0 0 255	28.3 67.7 -119.2	0.1 0.4 -0.2	0.5	0.1
0 128 0	50.4 -83.3 62.7	0.4 -0.7 0.6	1.0	0.4
0 128 128	52.3 -57.5 -13.7	0.3 0.1 -0.3	0.4	0.3
0 170 255	67.5 -43.9 -53.9	0.1 -0.2 0.0	0.2	0.1
0 255 0	84.8 -126.8 95.3	0.1 -0.2 0.4	0.5	0.1
0 255 170	86.3 -105.9 16.6	-0.0 0.2 -0.3	0.4	0.1
0 255 255	87.7 -87.0 -21.0	0.0 0.1 -0.2	0.2	0.1
85 85 85	43.8 -0.1 0.4	0.2 0.1 -0.4	0.4	0.4
128 0 0	33.9 64.7 58.7	0.6 0.6 0.7	1.1	0.5
128 0 128	37.2 70.7 -37.2	0.4 0.8 0.0	0.9	0.4
128 128 0	58.9 -10.1 77.2	0.4 0.2 1.0	1.0	0.4
128 128 128	60.5 -0.5 0.1	0.2 0.5 -0.1	0.6	0.8
128 128 255	63.8 19.6 -59.6	0.3 0.1 0.5	0.6	0.4
128 255 128	89.8 -72.0 44.4	-0.1 0.9 -0.5	1.1	0.2
170 0 255	50.9 91.3 -80.4	0.2 0.4 0.1	0.4	0.2
170 170 170	74.9 0.0 0.1	-0.0 -0.0 -0.1	0.1	0.1
170 255 0	91.5 -57.4 106.8	-0.0 0.0 0.4	0.4	0.1
170 255 255	94.1 -35.5 -10.4	-0.1 0.1 -0.0	0.2	0.1
255 0 0	60.2 98.5 104.2	0.2 0.2 -0.1	0.3	0.2
255 0 170	62.5 103.3 -17.8	0.2 0.2 -0.1	0.3	0.1
255 0 255	64.9 108.0 -56.3	0.1 0.2 0.1	0.2	0.1
255 128 128	75.5 56.8 26.1	0.1 -0.3 -0.4	0.6	0.2
255 170 0	81.9 30.0 107.5	0.1 -0.2 0.6	0.7	0.2
255 170 255	85.0 44.0 -23.9	-0.0 -0.1 0.0	0.1	0.0
255 255 0	97.8 -15.0 117.8	0.0 0.1 0.5	0.5	0.1
255 255 170	99.0 -7.6 38.1	-0.1 0.2 -0.1	0.2	0.1
255 255 255	100.0 0.0 -0.0	0.0 -0.0 -0.0	0.0	0.0
170 85 85	55.7 44.7 20.8	0.0 -0.2 -0.5	0.5	0.2
85 170 85	66.9 -56.3 35.1	-0.0 0.3 -0.5	0.6	0.2
85 85 170	46.5 15.5 -46.8	0.2 0.1 0.2	0.3	0.2
85 170 170	68.3 -41.9 -11.4	-0.0 0.3 -0.1	0.3	0.2
170 85 170	57.5 51.8 -27.6	0.1 -0.2 0.0	0.2	0.1
170 170 85	73.8 -8.3 47.0	-0.1 0.1 -0.5	0.6	0.2
Average			0.5	0.2
Maximum			1.5	0.8

Gamut-Volume

These measurements are only informative.

ISO Coated v2 (FOGRA39L)	100 %
sRGB	100 %
AdobeRGB	100 %
ECI-RGB v2.0	97 %



Softproof Quality

The measurements are converted to Lab values based on the measured whitepoint (xy: 0.3255 0.3417) and compared with the selected reference. The maximum allowed deviations to comply with this test are an average of 2.0 dE00 and a minimum Gamut volume of 90% for ISO Coated v2 (FOGRA39L).

		Limit	dE00
Average		2.0	0.5
Maximum		4.0	2.1
Primaries		5.0	1.3
Composite Gray Max		3.0	1.5

Reference (Lab)	Measurement (Lab)	Measurement (Yxy)	dE76	dE00
55.0 -37.0 -50.0	55.1 -34.7 -49.7	23.05 0.1698 0.2525	2.4	0.9
66.9 -24.7 -37.1	66.7 -25.0 -37.2	36.22 0.2262 0.2917	0.3	0.2
79.7 -12.5 -21.8	79.7 -12.4 -21.6	56.10 0.2863 0.3255	0.2	0.1
87.7 -5.8 -11.8	87.8 -6.1 -10.8	71.75 0.3181 0.3437	1.0	0.8
91.5 -3.0 -7.0	91.5 -3.3 -6.7	79.68 0.3298 0.3496	0.5	0.5
48.0 74.0 -3.0	47.9 74.5 -2.4	16.73 0.5125 0.2592	0.8	0.3
60.8 50.6 -6.7	60.7 51.2 -6.7	28.91 0.4314 0.2905	0.6	0.2
76.4 25.8 -6.9	76.4 25.8 -6.8	50.61 0.3756 0.3227	0.1	0.1
86.2 12.0 -5.2	86.3 12.0 -5.0	68.61 0.3553 0.3399	0.3	0.2
90.7 5.9 -3.9	90.8 5.8 -3.1	77.99 0.3490 0.3487	0.8	0.6
89.0 -5.0 93.0	89.2 -5.1 93.3	74.59 0.4599 0.4934	0.4	0.1
90.3 -4.7 62.6	90.3 -4.7 62.9	77.02 0.4310 0.4612	0.4	0.1
92.2 -3.5 31.1	92.4 -3.6 31.8	81.58 0.3903 0.4143	0.7	0.3
93.6 -1.6 13.3	93.8 -1.6 13.9	84.76 0.3656 0.3830	0.6	0.4
94.3 -0.9 5.4	94.4 -0.8 5.6	86.24 0.3535 0.3685	0.2	0.3
89.0 0.0 -1.8	89.0 -0.0 -1.6	74.27 0.3429 0.3557	0.2	0.2
82.8 0.0 -1.7	82.7 0.1 -1.9	61.58 0.3423 0.3549	0.3	0.3
69.3 0.0 -1.4	69.2 -0.1 -1.1	39.68 0.3431 0.3562	0.3	0.3
54.1 0.0 -1.0	53.7 0.8 -1.2	21.65 0.3445 0.3544	1.0	1.3
36.6 -0.0 -0.5	36.4 -0.0 -0.0	9.21 0.3455 0.3585	0.6	0.5
16.0 0.0 0.0	15.6 0.3 0.1	2.02 0.3478 0.3580	0.6	0.6
10.4 13.9 1.4	9.3 16.2 -0.0	1.04 0.4446 0.3041	2.9	2.1
33.4 25.4 20.9	33.4 25.0 22.1	7.72 0.5019 0.3730	1.2	0.9
34.4 -3.3 22.3	34.2 -2.7 22.9	8.08 0.4116 0.4432	0.9	0.7
24.0 22.0 -46.0	23.3 22.1 -46.2	3.90 0.2207 0.1585	0.7	0.5
40.9 17.9 -36.6	40.7 17.7 -36.5	11.65 0.2748 0.2311	0.3	0.2
63.7 10.3 -23.8	63.5 10.5 -24.3	32.17 0.3102 0.2939	0.6	0.3
79.4 5.1 -13.6	79.4 5.4 -13.4	55.56 0.3291 0.3282	0.4	0.4
87.2 2.6 -8.1	87.2 3.0 -8.1	70.35 0.3362 0.3417	0.4	0.6
47.0 68.0 48.0	46.9 68.4 48.3	15.94 0.6240 0.3296	0.5	0.1
58.5 47.1 37.9	58.3 47.7 38.2	26.31 0.5321 0.3639	0.7	0.3
74.2 22.9 21.4	74.1 22.9 21.6	46.85 0.4286 0.3743	0.2	0.1
85.0 10.0 9.8	85.1 9.9 10.0	66.18 0.3789 0.3675	0.3	0.3
90.0 4.7 3.7	90.0 4.6 3.9	76.31 0.3593 0.3615	0.3	0.3
50.0 -65.0 27.0	49.9 -65.7 27.9	18.35 0.2444 0.5579	1.1	0.3
62.1 -39.8 21.0	62.2 -40.3 21.5	30.66 0.3065 0.4656	0.7	0.3
77.0 -19.1 11.0	77.0 -19.2 11.0	51.61 0.3332 0.4002	0.1	0.1
86.3 -8.4 4.2	86.4 -8.3 4.4	68.88 0.3405 0.3738	0.3	0.2
90.8 -4.1 0.9	90.9 -4.6 1.3	78.20 0.3411 0.3645	0.6	0.6
88.5 -0.4 -3.1	88.6 -0.7 -2.8	73.33 0.3398 0.3542	0.5	0.6

82.0 -0.9 -4.1	82.0 -0.8 -4.3	60.23 0.3366 0.3511	0.2	0.2
67.7 -2.0 -4.4	67.6 -1.5 -4.3	37.46 0.3338 0.3505	0.5	0.6
52.2 -2.5 -3.5	52.0 -2.2 -3.6	20.10 0.3313 0.3515	0.4	0.4
37.5 -3.9 -3.1	37.3 -4.8 -2.4	9.70 0.3237 0.3577	1.2	1.4
26.3 -6.8 -3.4	26.2 -8.1 -2.7	4.82 0.3045 0.3622	1.5	1.5
10.4 -8.2 -10.2	9.9 -10.0 -11.0	1.12 0.2187 0.3007	2.0	1.6
24.3 32.7 13.1	24.1 32.2 13.8	4.12 0.5308 0.3297	0.8	0.6
24.7 -17.0 7.5	24.8 -17.7 8.8	4.35 0.3109 0.4437	1.5	0.9
23.0 0.0 0.0	22.1 -0.5 0.5	3.55 0.3458 0.3621	1.1	1.1
38.5 6.6 3.9	38.6 6.1 4.9	10.43 0.3793 0.3645	1.1	1.1
61.5 5.4 3.8	61.3 5.5 4.2	29.62 0.3666 0.3621	0.5	0.4
78.1 2.9 0.9	78.0 2.8 1.1	53.29 0.3524 0.3580	0.2	0.2
86.6 1.5 -0.7	86.7 1.5 -0.1	69.38 0.3478 0.3570	0.5	0.5
53.1 37.7 28.9	53.1 37.8 29.1	21.11 0.5043 0.3655	0.2	0.1
41.5 22.7 16.8	41.5 23.3 17.2	12.16 0.4628 0.3665	0.7	0.3
31.9 40.0 24.0	31.6 40.4 23.8	6.93 0.5607 0.3391	0.6	0.4
32.5 44.4 -1.8	32.5 44.7 -0.9	7.31 0.4820 0.2796	0.9	0.5
51.3 1.3 44.5	50.9 1.6 44.9	19.19 0.4521 0.4612	0.6	0.4
34.6 -36.4 13.9	34.4 -35.9 14.1	8.21 0.2740 0.4886	0.6	0.3
36.0 -26.2 -20.9	35.6 -26.8 -20.8	8.79 0.2045 0.3120	0.7	0.4
20.9 9.6 -23.6	20.2 8.6 -24.2	3.04 0.2613 0.2306	1.3	1.2
71.2 18.8 17.3	71.1 19.0 17.8	42.35 0.4168 0.3727	0.6	0.3
71.2 22.2 73.1	71.1 22.5 74.0	42.29 0.5091 0.4433	1.0	0.3
47.7 71.2 16.2	47.7 71.2 16.7	16.53 0.5618 0.2917	0.5	0.2
38.0 55.4 -20.9	38.0 55.6 -20.5	10.06 0.4234 0.2309	0.5	0.2
73.7 -22.8 67.6	73.6 -22.8 67.9	46.13 0.4122 0.5132	0.3	0.1
52.3 -52.3 -20.2	52.2 -52.7 -20.0	20.36 0.1869 0.3503	0.4	0.2
43.3 -17.0 -48.6	43.3 -17.1 -48.5	13.35 0.1769 0.2258	0.1	0.1
95.0 0.0 -2.0	95.1 -0.1 -1.3	87.79 0.3434 0.3564	0.7	0.6
15.7 -3.1 11.7	14.7 -3.6 12.8	1.85 0.3953 0.4451	1.6	1.1
34.7 28.5 -4.0	34.6 28.1 -3.3	8.28 0.4191 0.3023	0.9	0.5
25.8 -11.0 -14.4	25.7 -10.8 -14.2	4.63 0.2485 0.3106	0.3	0.2
Average			0.7	0.5
Gamut-Volume				100 %

Measurement Data

This table lists all RGB measurements. The XYZ values represent the values from the measurement device.

RGB	XYZ	Yxy
255 255 255	156.60 164.36 160.11	164.36 0.3255 0.3417
0 0 0	-0.01 -0.00 -0.04	-0.00 0.3333 0.3333
12 12 12	0.42 0.42 0.49	0.42 0.3153 0.3157
25 25 25	2.32 2.42 2.34	2.42 0.3277 0.3418
38 38 38	4.78 5.08 4.81	5.08 0.3257 0.3463
51 51 51	8.42 8.92 8.49	8.92 0.3261 0.3453
63 63 63	12.40 12.89 12.58	12.89 0.3274 0.3403
76 76 76	17.53 18.43 17.72	18.43 0.3266 0.3433
89 89 89	23.27 24.47 23.53	24.47 0.3266 0.3433
102 102 102	29.70 30.92 30.16	30.92 0.3271 0.3406
114 114 114	36.66 38.49 37.11	38.49 0.3266 0.3429
127 127 127	44.04 46.47 45.01	46.47 0.3250 0.3429
140 140 140	53.04 55.68 54.03	55.68 0.3259 0.3421
153 153 153	62.29 65.28 63.59	65.28 0.3259 0.3415
165 165 165	70.93 74.76 72.87	74.76 0.3245 0.3421
178 178 178	82.16 86.13 83.78	86.13 0.3259 0.3417
191 191 191	93.17 97.68 95.33	97.68 0.3256 0.3413
204 204 204	104.75 109.97 106.30	109.97 0.3263 0.3426
216 216 216	116.28 122.14 118.23	122.14 0.3260 0.3425
229 229 229	129.01 135.59 130.92	135.59 0.3262 0.3428
242 242 242	142.66 149.89 144.77	149.89 0.3262 0.3427
0 0 128	7.36 3.00 42.74	3.00 0.1386 0.0565
0 0 255	25.84 10.39 150.64	10.39 0.1383 0.0556
0 128 0	9.92 30.85 2.51	30.85 0.2291 0.7129
0 128 128	17.31 33.99 45.46	33.99 0.1789 0.3513
0 170 255	42.73 62.58 155.37	62.58 0.1639 0.2401
0 255 0	34.71 108.25 8.78	108.25 0.2288 0.7134
0 255 170	47.28 113.65 81.20	113.65 0.1953 0.4694
0 255 255	60.71 118.91 159.54	118.91 0.1790 0.3506
85 85 85	21.41 22.51 21.68	22.51 0.3264 0.3431
128 0 0	26.76 12.65 0.01	12.65 0.6789 0.3208
128 0 128	34.30 15.75 43.06	15.75 0.3684 0.1692
128 128 0	37.13 43.86 2.57	43.86 0.4443 0.5249
128 128 128	44.66 47.09 45.80	47.09 0.3247 0.3424
128 128 255	63.21 54.41 154.16	54.41 0.2326 0.2002
128 255 128	69.66 124.98 52.01	124.98 0.2824 0.5067
170 0 255	71.57 32.04 150.94	32.04 0.2812 0.1259
170 170 170	75.46 79.20 77.03	79.20 0.3257 0.3418
170 255 0	80.92 130.43 8.84	130.43 0.3675 0.5924
170 255 255	107.12 141.17 160.38	141.17 0.2621 0.3454
255 0 0	95.12 45.05 0.10	45.05 0.6781 0.3212
255 0 170	107.69 50.09 72.49	50.09 0.4677 0.2175
255 0 255	121.19 55.50 151.02	55.50 0.3698 0.1694
255 128 128	113.41 79.60 45.73	79.60 0.4750 0.3334
255 170 0	112.39 97.36 4.30	97.36 0.5251 0.4548
255 170 255	138.80 108.22 155.84	108.22 0.3445 0.2686
255 255 0	130.43 153.84 8.86	153.84 0.4450 0.5248
255 255 170	143.34 159.36 81.78	159.36 0.3728 0.4145
170 85 85	54.61 38.27 21.81	38.27 0.4761 0.3337
85 170 85	33.54 60.11 24.81	60.11 0.2831 0.5074
85 85 170	30.36 26.10 74.05	26.10 0.2326 0.2000

85 170 170	42.46 63.66 77.04	63.66 0.2318 0.3476
170 85 170	63.41 41.76 73.98	41.76 0.3540 0.2331
170 170 85	66.60 75.77 24.82	75.77 0.3983 0.4532
0 130 203	27.37 38.76 102.62	38.76 0.1622 0.2297
86 159 217	47.58 60.34 116.40	60.34 0.2121 0.2690
155 193 230	81.50 92.77 129.98	92.77 0.2679 0.3049
197 216 236	108.60 118.24 137.13	118.24 0.2984 0.3249
216 227 240	122.59 131.16 141.92	131.16 0.3098 0.3315
173 32 102	53.33 27.00 28.79	27.00 0.4887 0.2474
187 93 142	69.56 47.14 53.93	47.14 0.4077 0.2763
207 158 189	95.74 82.98 92.03	82.98 0.3536 0.3065
222 199 218	116.61 112.69 119.52	112.69 0.3343 0.3231
229 218 230	126.89 128.17 131.31	128.17 0.3284 0.3317
234 218 45	109.73 121.58 13.14	121.58 0.4489 0.4974
234 222 100	114.26 125.75 34.49	125.75 0.4162 0.4581
235 229 163	123.14 133.56 74.40	133.56 0.3719 0.4034
236 233 204	130.54 139.04 107.83	139.04 0.3459 0.3684
236 235 223	134.01 141.64 126.17	141.64 0.3335 0.3525
215 216 220	116.37 122.10 122.19	122.10 0.3227 0.3385
194 195 199	96.58 101.24 102.02	101.24 0.3221 0.3377
152 153 155	62.11 65.23 65.02	65.23 0.3229 0.3391
110 110 112	34.20 35.59 35.72	35.59 0.3242 0.3373
68 68 69	14.42 15.14 14.76	15.14 0.3254 0.3416
30 30 30	3.18 3.31 3.22	3.31 0.3275 0.3412
30 17 21	2.45 1.69 1.67	1.69 0.4217 0.2908
88 49 38	16.56 12.52 5.02	12.52 0.4857 0.3671
66 65 37	11.96 13.21 5.10	13.21 0.3951 0.4365
42 35 104	9.50 6.61 29.80	6.61 0.2069 0.1439
80 70 135	23.34 19.38 48.53	19.38 0.2558 0.2124
138 131 181	56.09 53.13 84.31	53.13 0.2898 0.2745
185 181 212	91.15 91.49 112.75	91.49 0.3086 0.3097
210 208 227	112.89 115.75 128.83	115.75 0.3158 0.3238
170 38 35	47.98 25.54 4.43	25.54 0.6156 0.3276
185 89 67	61.29 42.56 14.60	42.56 0.5174 0.3593
205 152 130	86.09 76.47 47.85	76.47 0.4092 0.3634
221 196 183	110.19 108.47 88.64	108.47 0.3586 0.3530
228 216 212	122.88 125.27 114.41	125.27 0.3389 0.3455
29 122 58	12.79 30.28 12.43	30.28 0.2305 0.5455
90 150 96	32.41 50.47 28.93	50.47 0.2899 0.4514
155 187 155	69.47 84.86 66.58	84.86 0.3145 0.3841
197 212 198	101.76 113.24 102.11	113.24 0.3209 0.3571
216 225 220	118.84 128.58 122.61	128.58 0.3212 0.3475
212 215 221	114.45 120.60 123.03	120.60 0.3196 0.3368
189 193 201	94.02 99.08 104.00	99.08 0.3165 0.3335
144 149 156	58.12 61.64 65.51	61.64 0.3137 0.3327
101 107 111	30.87 33.09 35.21	33.09 0.3113 0.3336
65 72 74	14.31 15.97 16.77	15.97 0.3041 0.3395
41 50 51	6.63 7.95 8.61	7.95 0.2857 0.3430
13 24 31	1.38 1.86 3.47	1.86 0.2053 0.2774
71 28 31	10.60 6.65 3.40	6.65 0.5133 0.3223
33 50 36	4.91 7.15 4.64	7.15 0.2938 0.4284
41 41 41	5.50 5.83 5.55	5.83 0.3257 0.3454
80 70 67	17.53 17.09 14.22	17.09 0.3589 0.3499
138 127 124	48.53 48.59 43.08	48.59 0.3462 0.3466
184 178 178	85.11 87.53 83.65	87.53 0.3321 0.3415
210 207 209	109.76 114.02 111.37	114.02 0.3275 0.3402

156 84 67	46.48 34.24 14.60	34.24 0.4876 0.3592
106 67 58	24.59 19.80 10.99	19.80 0.4440 0.3575
97 36 33	18.26 11.17 3.99	11.17 0.5464 0.3342
99 34 63	20.33 11.85 12.16	11.85 0.4585 0.2673
114 102 41	29.81 31.29 6.89	31.29 0.4385 0.4602
33 75 46	7.40 13.55 7.68	13.55 0.2585 0.4731
27 76 96	9.81 14.66 26.49	14.66 0.1926 0.2877
37 35 66	5.84 5.07 13.06	5.07 0.2436 0.2115
189 146 128	76.11 69.19 46.42	69.19 0.3970 0.3609
203 143 42	76.86 68.66 8.63	68.66 0.4986 0.4454
172 36 74	50.97 26.58 16.23	26.58 0.5434 0.2835
119 35 103	30.15 16.41 29.41	16.41 0.3969 0.2160
155 177 51	58.49 75.41 12.65	75.41 0.3991 0.5146
9 126 138	18.48 33.94 52.20	33.94 0.1766 0.3244
25 92 163	18.50 22.50 68.75	22.50 0.1686 0.2050
236 237 241	137.49 144.31 143.55	144.31 0.3232 0.3393
29 30 19	2.61 3.02 1.27	3.02 0.3783 0.4371
89 50 70	18.61 13.53 14.86	13.53 0.3960 0.2878
32 50 64	6.20 7.69 12.78	7.69 0.2325 0.2884