## Performance $f_{STRESS}$ for Small Colour Difference data (SCD)

| data set | Calculations with data for grey backgrounds (chromaticity near D65) | | | | | | | | | |
|---|---|---|---|---|---|---|---|---|---|---|
| Name | Pairs | Colour difference $\Delta E^*_{ab}$ | | | | Performance $f_{STRESS}$ calculated by formula | | | | |
| | | range | min | max | mean | CIELAB $\Delta E^*_{ab\_PF}$ | CMC $\Delta E^*_{CM\_PF}$ | CIE94 $\Delta E^*_{94\_PF}$ | CIEDE2000 $\Delta E^*_{00\_PF}$ | LABJND $\Delta E^*_{85\_PF}$ |
| WA_S0418 | 418 | 0,0 to <99,0 | 0,12 | 10,62 | 1,86 | 41,5 | 32,7 | 30,6 | 28,5 | 44,0 |
| RA_S0312 | 312 | 0,0 to <99,0 | 0,77 | 4,40 | 1,43 | 17,6 | 17,8 | 14,1 | 13,4 | 15,3 |
| LA_S0307 | 307 | 0,0 to <99,0 | 0,39 | 4,73 | 1,63 | 29,8 | 20,2 | 24,4 | 17,6 | 26,0 |
| BA_S2776 | 2776 | 0,0 to <99,0 | 0,03 | 18,20 | 3,00 | 37,2 | 29,6 | 30,8 | 28,4 | 43,1 |
| SA_S0446 | 446 | 0,0 to <99,0 | 0,17 | 7,96 | 3,03 | 32,5 | 24,1 | 23,4 | 22,4 | 30,3 |
| WA_S0418 | 400 | 0,0 to <5,0 | 0,12 | 4,94 | 1,67 | 43,4 | 33,8 | 31,5 | 29,4 | 44,5 |
| RA_S0312 | 312 | 0,0 to <5,0 | 0,77 | 4,40 | 1,43 | 17,6 | 17,8 | 14,1 | 13,4 | 15,3 |
| LA_S0307 | 307 | 0,0 to <5,0 | 0,39 | 4,73 | 1,63 | 29,8 | 20,2 | 24,4 | 17,6 | 26,0 |
| BA_S2776 | 2325 | 0,0 to <5,0 | 0,03 | 4,99 | 2,14 | 39,0 | 29,7 | 32,1 | 28,7 | 43,3 |
| SA_S0446 | 385 | 0,0 to <5,0 | 0,17 | 4,96 | 2,57 | 31,7 | 24,3 | 24,2 | 22,5 | 31,1 |
| WA_S0418 | 18 | 5,0 to <99,0 | 5,03 | 10,62 | 6,15 | 19,4 | 22,1 | 22,0 | 20,2 | 27,5 |
| RA_S0312 | 0 | 5,0 to <99,0 | | | | | | | | |
| LA_S0307 | 0 | 5,0 to <99,0 | | | | | | | | |
| BA_S2776 | 451 | 5,0 to <99,0 | 5,00 | 18,20 | 7,43 | 34,4 | 28,5 | 28,7 | 27,3 | 33,7 |
| SA_S0446 | 61 | 5,0 to <99,0 | 5,00 | 7,96 | 5,93 | 32,0 | 20,8 | 17,5 | 17,0 | 26,1 |
| WA_S0418 | 17 | 5,0 to <10,0 | 5,03 | 8,74 | 5,89 | 20,5 | 23,3 | 23,0 | 21,3 | 27,9 |
| RA_S0312 | 0 | 5,0 to <10,0 | | | | | | | | |
| LA_S0307 | 0 | 5,0 to <10,0 | | | | | | | | |
| BA_S2776 | 389 | 5,0 to <10,0 | 5,00 | 9,91 | 6,65 | 35,4 | 29,0 | 29,9 | 27,6 | 34,5 |
| SA_S0446 | 61 | 5,0 to <10,0 | 5,00 | 7,96 | 5,93 | 32,0 | 20,8 | 17,5 | 17,0 | 26,1 |
| WA_S0418 | 1 | 10,0 to <15,0 | 10,62 | 10,62 | 10,62 | 0,1 | 0,1 | 0,1 | 0,1 | 0,1 |
| RA_S0312 | 0 | 10,0 to <15,0 | | | | | | | | |
| LA_S0307 | 0 | 10,0 to <15,0 | | | | | | | | |
| BA_S2776 | 53 | 10,0 to <15,0 | 10,05 | 14,69 | 11,64 | 31,3 | 25,2 | 21,6 | 23,9 | 25,0 |
| SA_S0446 | 0 | 10,0 to <15,0 | | | | | | | | |
| WA_S0418 | 0 | 15,0 to <20,0 | | | | | | | | |
| RA_S0312 | 0 | 15,0 to <20,0 | | | | | | | | |
| LA_S0307 | 0 | 15,0 to <20,0 | | | | | | | | |
| BA_S2776 | 9 | 15,0 to <20,0 | 15,11 | 18,20 | 16,53 | 21,7 | 27,9 | 27,7 | 28,0 | 25,3 |
| SA_S0446 | 0 | 15,0 to <20,0 | | | | | | | | |
| WA_S0418 | 0 | 20,0 to <99,0 | | | | | | | | |
| RA_S0312 | 0 | 20,0 to <99,0 | | | | | | | | |
| LA_S0307 | 0 | 20,0 to <99,0 | | | | | | | | |
| BA_S2776 | 0 | 20,0 to <99,0 | | | | | | | | |
| SA_S0446 | 0 | 20,0 to <99,0 | | | | | | | | |

data sets:
*WA_S0418, RA_S0312, LA_S0307, BA_S2776, SA_S0446*

## Performance $f_{STRESS}$ for Small Colour Difference data (SCD)

| data set Name | Pairs | Calculations with data for grey backgrounds (chromaticity near D65) Colour difference $\Delta E^*_{00}$ range | min | max | mean | Performance $f_{STRESS}$ calculated by formula CIELAB $\Delta E^*_{ab\_PF}$ | CMC $\Delta E^*_{CM\_PF}$ | CIE94 $\Delta E^*_{94\_PF}$ | CIEDE2000 $\Delta E^*_{00\_PF}$ | LABJND $\Delta E^*_{85\_PF}$ |
|---|---|---|---|---|---|---|---|---|---|---|
| WA_S0418 | 418 | 0,0 to <99,0 | 0,12 | 10,62 | 1,86 | 41,5 | 32,7 | 30,6 | 28,5 | 44,0 |
| RA_S0312 | 312 | 0,0 to <99,0 | 0,77 | 4,40 | 1,43 | 17,6 | 17,8 | 14,1 | 13,4 | 15,3 |
| LA_S0307 | 307 | 0,0 to <99,0 | 0,39 | 4,73 | 1,63 | 29,8 | 20,2 | 24,4 | 17,6 | 26,0 |
| BA_S2776 | 2776 | 0,0 to <99,0 | 0,03 | 18,20 | 3,00 | 37,2 | 29,6 | 30,8 | 28,4 | 43,1 |
| SA_S0446 | 446 | 0,0 to <99,0 | 0,17 | 7,96 | 3,03 | 32,5 | 24,1 | 23,4 | 22,4 | 30,3 |
| WA_S0418 | 418 | 0,0 to <5,0 | 0,12 | 10,62 | 1,86 | 41,5 | 32,7 | 30,6 | 28,5 | 44,0 |
| RA_S0312 | 312 | 0,0 to <5,0 | 0,77 | 4,40 | 1,43 | 17,6 | 17,8 | 14,1 | 13,4 | 15,3 |
| LA_S0307 | 307 | 0,0 to <5,0 | 0,39 | 4,73 | 1,63 | 29,8 | 20,2 | 24,4 | 17,6 | 26,0 |
| BA_S2776 | 2709 | 0,0 to <5,0 | 0,03 | 16,07 | 2,82 | 37,7 | 30,0 | 31,6 | 28,8 | 43,1 |
| SA_S0446 | 443 | 0,0 to <5,0 | 0,17 | 7,96 | 3,01 | 32,3 | 24,4 | 23,7 | 22,7 | 29,7 |
| WA_S0418 | 0 | 5,0 to <99,0 | | | | | | | | |
| RA_S0312 | 0 | 5,0 to <99,0 | | | | | | | | |
| LA_S0307 | 0 | 5,0 to <99,0 | | | | | | | | |
| BA_S2776 | 67 | 5,0 to <99,0 | 3,60 | 18,20 | 10,29 | 28,0 | 26,3 | 25,1 | 25,8 | 29,0 |
| SA_S0446 | 3 | 5,0 to <99,0 | 5,35 | 7,13 | 6,19 | 16,3 | 6,8 | 8,0 | 7,1 | 14,1 |
| WA_S0418 | 0 | 5,0 to <10,0 | | | | | | | | |
| RA_S0312 | 0 | 5,0 to <10,0 | | | | | | | | |
| LA_S0307 | 0 | 5,0 to <10,0 | | | | | | | | |
| BA_S2776 | 66 | 5,0 to <10,0 | 3,60 | 18,15 | 10,17 | 27,3 | 25,3 | 24,2 | 24,9 | 29,1 |
| SA_S0446 | 3 | 5,0 to <10,0 | 5,35 | 7,13 | 6,19 | 16,3 | 6,8 | 8,0 | 7,1 | 14,1 |
| WA_S0418 | 0 | 10,0 to <15,0 | | | | | | | | |
| RA_S0312 | 0 | 10,0 to <15,0 | | | | | | | | |
| LA_S0307 | 0 | 10,0 to <15,0 | | | | | | | | |
| BA_S2776 | 1 | 10,0 to <15,0 | 18,20 | 18,20 | 18,20 | 0,1 | 0,1 | 0,1 | 0,1 | 0,1 |
| SA_S0446 | 0 | 10,0 to <15,0 | | | | | | | | |
| WA_S0418 | 0 | 15,0 to <20,0 | | | | | | | | |
| RA_S0312 | 0 | 15,0 to <20,0 | | | | | | | | |
| LA_S0307 | 0 | 15,0 to <20,0 | | | | | | | | |
| BA_S2776 | 0 | 15,0 to <20,0 | | | | | | | | |
| SA_S0446 | 0 | 15,0 to <20,0 | | | | | | | | |
| WA_S0418 | 0 | 20,0 to <99,0 | | | | | | | | |
| RA_S0312 | 0 | 20,0 to <99,0 | | | | | | | | |
| LA_S0307 | 0 | 20,0 to <99,0 | | | | | | | | |
| BA_S2776 | 0 | 20,0 to <99,0 | | | | | | | | |
| SA_S0446 | 0 | 20,0 to <99,0 | | | | | | | | |

data sets:
*WA_S0418, RA_S0312, LA_S0307, BA_S2776, SA_S0446*

## Performance $f_{STRESS}$ for Small Colour Difference data (SCD)

| data set | Calculations with data for grey backgrounds (chromaticity near D65) | | | | | | | | | |
|---|---|---|---|---|---|---|---|---|---|---|
| Name | Pairs | Colour difference $\Delta E^*_{85}$ | | | | Performance $f_{STRESS}$ calculated by formula | | | | |
| | | range | min | max | mean | CIELAB $\Delta E^*_{ab\_PF}$ | CMC $\Delta E^*_{CM\_PF}$ | CIE94 $\Delta E^*_{94\_PF}$ | CIEDE2000 $\Delta E^*_{00\_PF}$ | LABJND $\Delta E^*_{85\_PF}$ |
| WA_S0418 | 418 | 0,0 to <99,0 | 0,12 | 10,62 | 1,86 | 41,5 | 32,7 | 30,6 | 28,5 | 44,0 |
| RA_S0312 | 312 | 0,0 to <99,0 | 0,77 | 4,40 | 1,43 | 17,6 | 17,8 | 14,1 | 13,4 | 15,3 |
| LA_S0307 | 307 | 0,0 to <99,0 | 0,39 | 4,73 | 1,63 | 29,8 | 20,2 | 24,4 | 17,6 | 26,0 |
| BA_S2776 | 2776 | 0,0 to <99,0 | 0,03 | 18,20 | 3,00 | 37,2 | 29,6 | 30,8 | 28,4 | 43,1 |
| SA_S0446 | 446 | 0,0 to <99,0 | 0,17 | 7,96 | 3,03 | 32,5 | 24,1 | 23,4 | 22,4 | 30,3 |
| WA_S0418 | 189 | 0,0 to <5,0 | 0,12 | 4,39 | 1,11 | 46,3 | 33,5 | 34,1 | 30,7 | 49,8 |
| RA_S0312 | 87 | 0,0 to <5,0 | 0,77 | 4,40 | 1,56 | 19,1 | 12,4 | 9,4 | 11,3 | 9,0 |
| LA_S0307 | 86 | 0,0 to <5,0 | 0,39 | 2,50 | 1,39 | 34,8 | 21,8 | 23,9 | 20,0 | 28,0 |
| BA_S2776 | 851 | 0,0 to <5,0 | 0,03 | 6,06 | 1,09 | 43,7 | 32,7 | 33,1 | 29,7 | 52,0 |
| SA_S0446 | 90 | 0,0 to <5,0 | 0,17 | 5,15 | 1,44 | 39,9 | 34,7 | 31,9 | 31,4 | 28,6 |
| WA_S0418 | 229 | 5,0 to <99,0 | 0,59 | 10,62 | 2,48 | 39,7 | 32,5 | 29,1 | 27,8 | 41,7 |
| RA_S0312 | 225 | 5,0 to <99,0 | 0,77 | 3,64 | 1,38 | 16,6 | 19,5 | 14,4 | 14,1 | 9,1 |
| LA_S0307 | 221 | 5,0 to <99,0 | 0,52 | 4,73 | 1,72 | 28,1 | 19,6 | 23,6 | 16,8 | 23,4 |
| BA_S2776 | 1925 | 5,0 to <99,0 | 0,55 | 18,20 | 3,84 | 35,8 | 29,1 | 30,6 | 28,1 | 40,9 |
| SA_S0446 | 356 | 5,0 to <99,0 | 0,65 | 7,96 | 3,43 | 31,4 | 22,1 | 21,1 | 20,3 | 30,5 |
| WA_S0418 | 133 | 5,0 to <10,0 | 0,59 | 6,68 | 2,31 | 40,3 | 30,0 | 28,9 | 27,8 | 42,6 |
| RA_S0312 | 171 | 5,0 to <10,0 | 0,77 | 3,64 | 1,33 | 15,6 | 18,8 | 13,2 | 13,8 | 6,3 |
| LA_S0307 | 94 | 5,0 to <10,0 | 0,52 | 3,67 | 1,49 | 33,9 | 19,4 | 22,8 | 19,0 | 27,6 |
| BA_S2776 | 799 | 5,0 to <10,0 | 0,55 | 12,92 | 2,66 | 36,9 | 27,9 | 28,2 | 23,9 | 41,8 |
| SA_S0446 | 173 | 5,0 to <10,0 | 0,65 | 7,27 | 2,97 | 32,8 | 26,2 | 23,1 | 23,3 | 27,6 |
| WA_S0418 | 70 | 10,0 to <15,0 | 1,08 | 10,62 | 2,50 | 37,3 | 32,4 | 28,9 | 25,7 | 41,8 |
| RA_S0312 | 50 | 10,0 to <15,0 | 0,93 | 2,88 | 1,49 | 15,5 | 16,8 | 11,6 | 15,1 | 2,4 |
| LA_S0307 | 68 | 10,0 to <15,0 | 0,92 | 2,94 | 1,60 | 25,9 | 20,0 | 24,2 | 17,1 | 20,6 |
| BA_S2776 | 392 | 10,0 to <15,0 | 0,93 | 14,40 | 3,88 | 32,0 | 26,4 | 28,1 | 24,9 | 42,6 |
| SA_S0446 | 111 | 10,0 to <15,0 | 1,45 | 7,94 | 3,37 | 33,6 | 21,6 | 22,7 | 21,0 | 33,5 |
| WA_S0418 | 16 | 15,0 to <20,0 | 1,84 | 7,51 | 3,27 | 43,7 | 41,8 | 33,3 | 34,5 | 41,7 |
| RA_S0312 | 4 | 15,0 to <20,0 | 1,74 | 3,22 | 2,48 | 16,5 | 7,2 | 9,3 | 6,5 | 1,1 |
| LA_S0307 | 42 | 15,0 to <20,0 | 1,34 | 3,67 | 1,98 | 21,6 | 19,8 | 18,5 | 13,8 | 17,8 |
| BA_S2776 | 225 | 15,0 to <20,0 | 1,45 | 13,66 | 4,00 | 35,2 | 28,6 | 30,1 | 27,0 | 45,7 |
| SA_S0446 | 43 | 15,0 to <20,0 | 1,63 | 7,13 | 4,00 | 24,2 | 18,0 | 17,2 | 17,1 | 32,2 |
| WA_S0418 | 10 | 20,0 to <99,0 | 2,12 | 5,67 | 3,34 | 36,8 | 31,8 | 19,9 | 20,8 | 30,1 |
| RA_S0312 | 0 | 20,0 to <99,0 | | | | | | | | |
| LA_S0307 | 17 | 20,0 to <99,0 | 1,89 | 4,73 | 2,77 | 22,1 | 16,5 | 18,5 | 12,8 | 13,1 |
| BA_S2776 | 509 | 20,0 to <99,0 | 2,00 | 18,20 | 5,60 | 34,7 | 30,3 | 32,2 | 31,0 | 38,1 |
| SA_S0446 | 29 | 20,0 to <99,0 | 2,69 | 7,96 | 5,58 | 18,8 | 13,4 | 12,3 | 10,4 | 25,8 |

data sets:
*WA_S0418, RA_S0312, LA_S0307, BA_S2776, SA_S0446*