```
% Linear calibration of ASUS259 - located in DDPI-mk2 room.
% NVIDIA parameters determined from colormeter measurements on
 Feb-25-2022
% Data collected by RL on June 25, 2021. Minolta CS 100 was placed
 ~1.2 m
% from monitor on a tripod.
% Monitor settings: Contrast 25, Brightness 0.
```

NVIDIA color corrections: RGB - all channels set to 2.13, Contrast 0, Brightness 0.

```
pixel = [0:(255/6):255];
lum = [....
 0.0367;... % 0
 3.64;... % 42.67
 6.5233;... %85.33
 9.6;... %128
 13;... % 170.67
 16.3667;... % 213.33
 19.7; ...255
 ];
red = [....
 0.04;... % 0
 0.8;... % 42.67
 1.3867;... %85.33
 1.9433;... %128
 2.5467;... % 170.67
 3.2267;... % 213.33
 3.88; ...255
 ];
green = [....
 0.04;... % 0
 2.7533;... % 42.67
 4.8833;... %85.33
 7.2033;... %128
 9.7467;... % 170.67
 12.3;... % 213.33
 14.9; ...255
 ];

blue = [....
 0.0455;... % 0
 0.2767;... % 42.67
 0.4767;... %85.33
 0.6933;... %128
 0.94;... % 170.67
 1.1733;... % 213.33
 1.4033; ...255
 ];
data = {lum, red, green, blue};
```
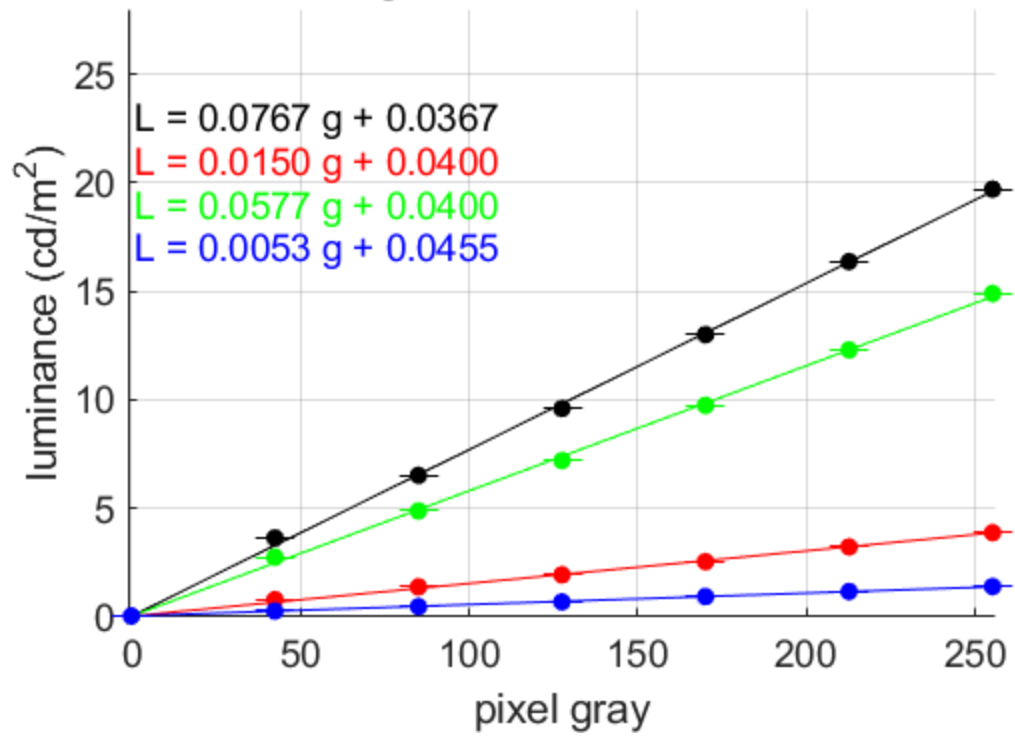
```matlab
cols = 'krgb';
slopes = nan(size(data));
figure(1); clf; hold on;
for ii = 1:length(data)
 m = mean(data{ii}, 2);
 s = std(data{ii}, [], 2);
 % force intercept to go through our measured 0
 lm = fitlm(pixel, m - m(1), 'y~x1-1');
 slope = lm.Coefficients{1, 1};
 b = m(1);
 % free intercept parameter
% lm = fitlm(pixel, m);
% slope = lm.Coefficients{2, 1};
% b = lm.Coefficients{1, 1};
 slopes(ii) = slope;
 plot(pixel, pixel * slope + b, '-', 'Color', cols(ii));
 errorbar(pixel, m, s, 'o', ...
 'Color', cols(ii), 'MarkerFaceColor', cols(ii), 'CapSize', 14);
 text(1, 25 - ii*2, sprintf('L = %1.4f g + %1.4f', slope, b), 'Color',
 cols(ii),...
 'FontSize', 14);
end
xlim([-1, 256]);
ylim([0, 28]);
grid on;
title({'ASUS 259 (360 Hz), Feb 25, 2022 Measurements','one gamma for
 all channels'});
xlabel('pixel gray');
ylabel('luminance (cd/m^2)');
set(gca, 'FontSize', 14);
hold off;
fprintf('R to B: %1.2f\n', slopes(2) / slopes(4));
fprintf('G to B: %1.2f\n', slopes(3) / slopes(4));

R to B: 2.85
G to B: 10.94
```

ASUS 259 (360 Hz), Feb 25, 2022 Measurements
one gamma for all channels

$L = 0.0767\ g + 0.0367$

$L = 0.0150\ g + 0.0400$

$L = 0.0577\ g + 0.0400$

$L = 0.0053\ g + 0.0455$

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