**ນາງ ໃຈປະສົງ ວົງພັນສີ 3CS2**

**ວຽກບ້ານ**

Lecture (week 5)

* ຈົ່ງປ່ຽນແບບຈຳລອງສີລຸ່ມນີ້:

1. (R=70,G=40,B=125) ເປັນແບບ (Y,Cb,Cr)

**ແກ້:**

Y = 0.299\*R + 0.587\*G+0.114\*B

= 0.299\*70 + 0.587\*40 + 0.114 \*125 = 58.66 59

Cb = 0.564\*(B-Y)+128

= 0.564\*(125-59)+128 = 165.224 165

Cr = 0.713\*(R-Y)+128

= 0.713\*(70-59)+128 = 135.843 136

1. (Y=105,Cb=200,Cr=35) ເປັນແບບ (R,G,B)

**ແກ້:**

R = Y + 1.403\*(Cr-128)

= 105 + 1.403\*(35-128) = -25.479 -25

G = Cb - 0.344\*(Cb-128) - 0.714\*(Cr-128)

= 200 – 0.344\*(200 – 128) – 0.714\*(35 – 128) = 241.634 242

B = Cr + 1.773\*(Cb-128)

= 35 + 1.773\*(200 – 128) = 162.656 163

1. (R=45,G=100,B=200) ເປັນແບບ (H,S,V)

**ແກ້:**

ດັ່ງນັ້ນ, (,G = 100 ,B = 200) ຈະໄດ້ (H= , S=0.775, V = 200)