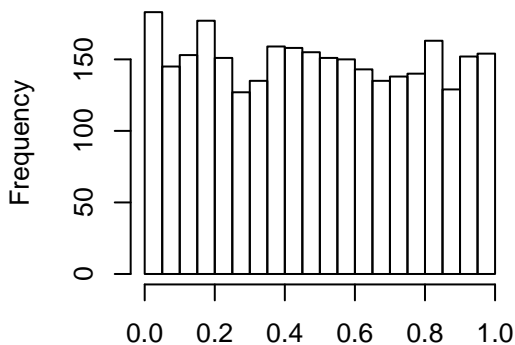
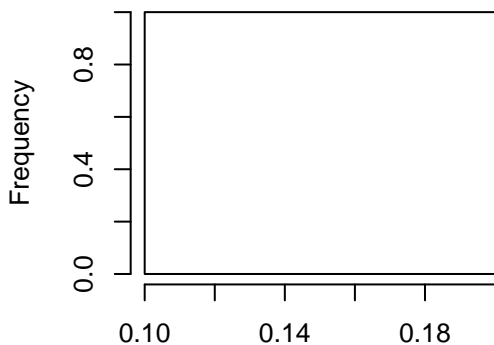


perm pvalues



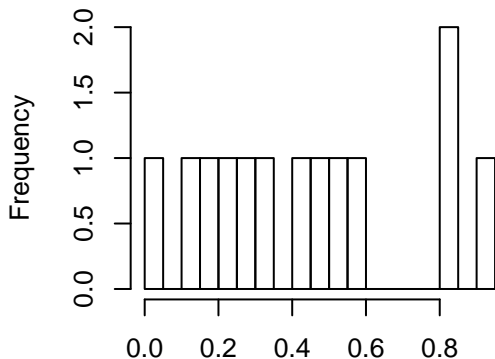
rawp
n=2998

s,rawM_0zero_num<max(20,min(rawM_0zero_num,100))



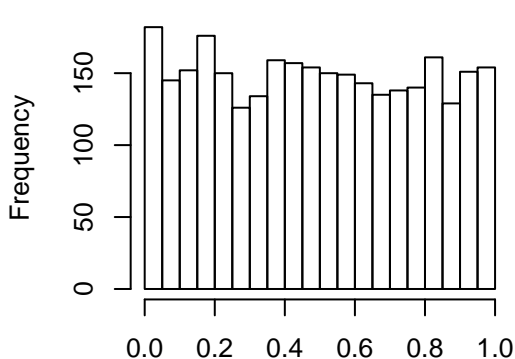
rawp[rawM_0zero_num < max(20, min(rawM_0zero_num, 100))]
n=1, ks_pval=1

perm pvalues,rawM_0zero_num >= 20



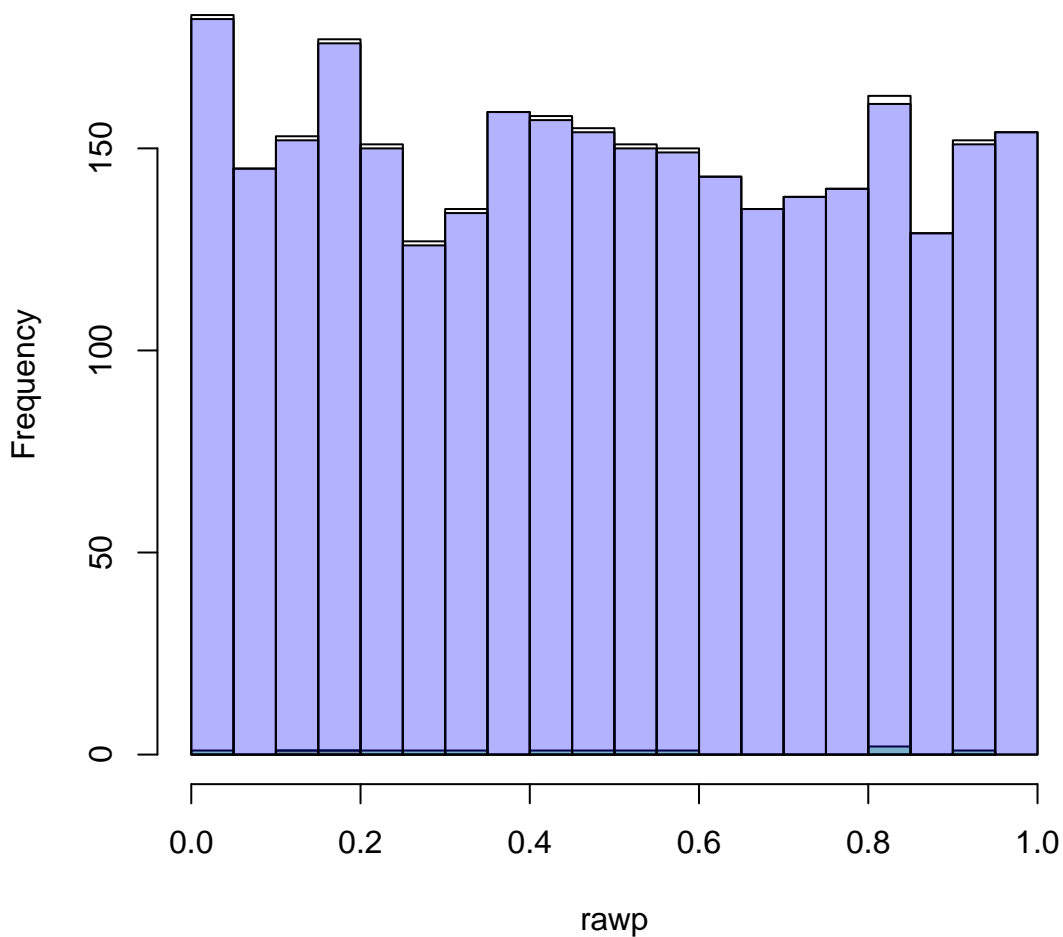
rawp[rawM_0zero_num >= 20 & rawM_0zero_num <= 100]
n=13, ks_pval=0.879324396686437

perm pvalues,rawM_0zero_num >= 100

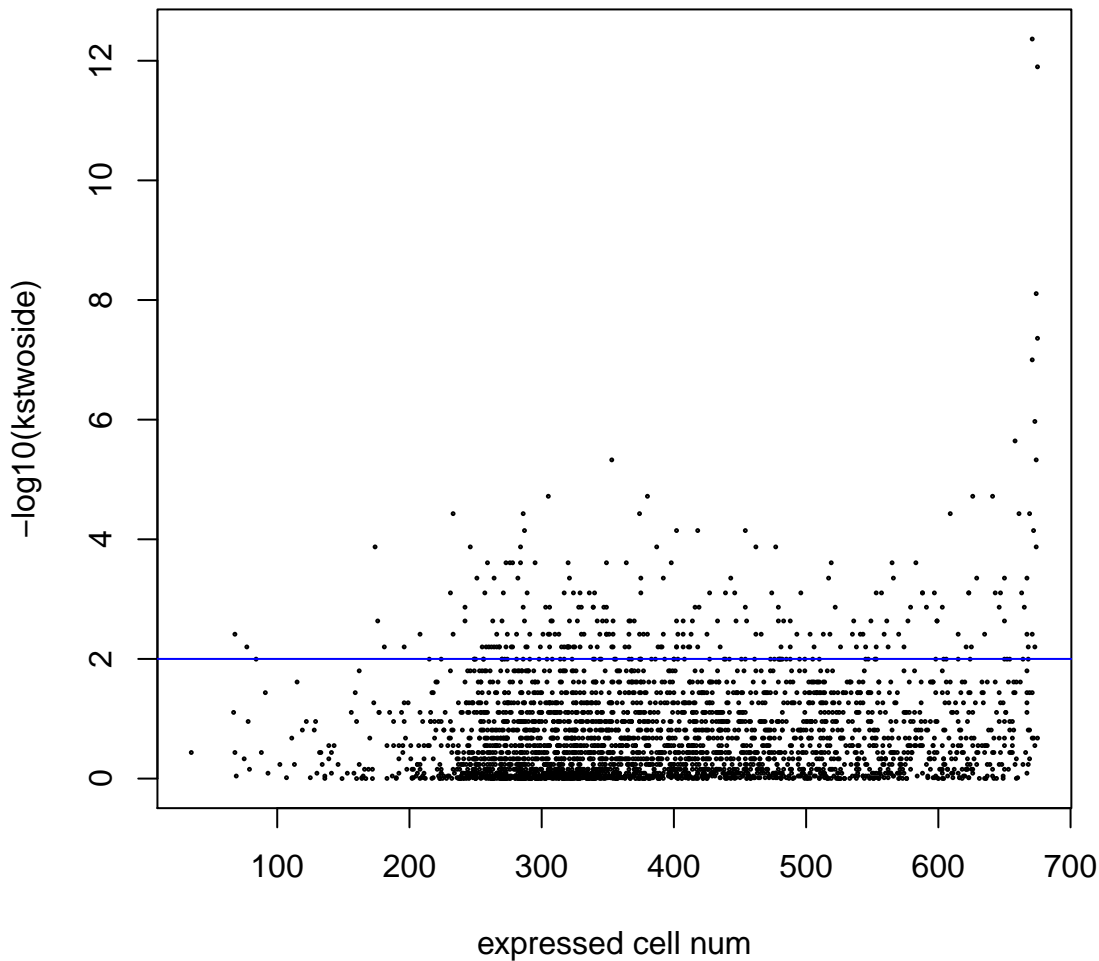


rawp[rawM_0zero_num >= 100]
n=2985, ks_pval=0.561345214656956

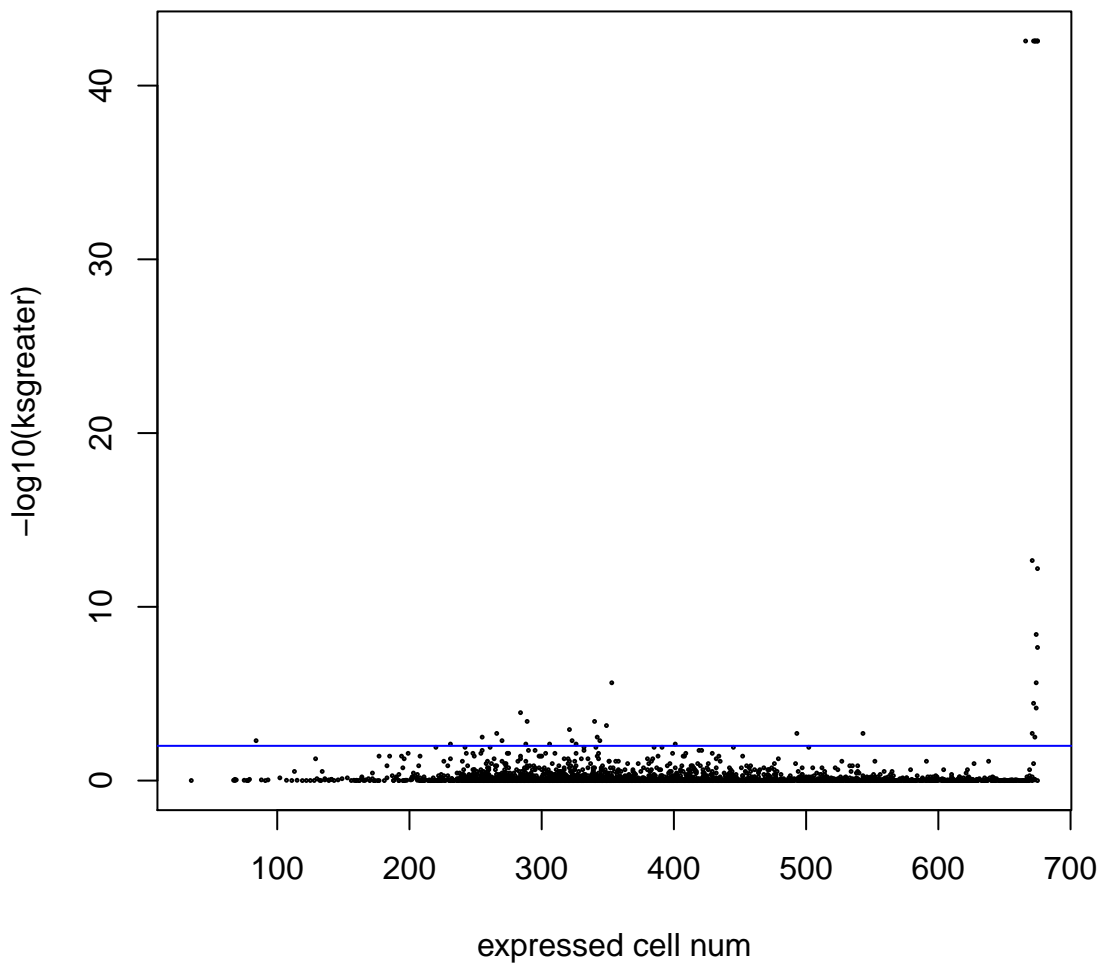
perm pvalues



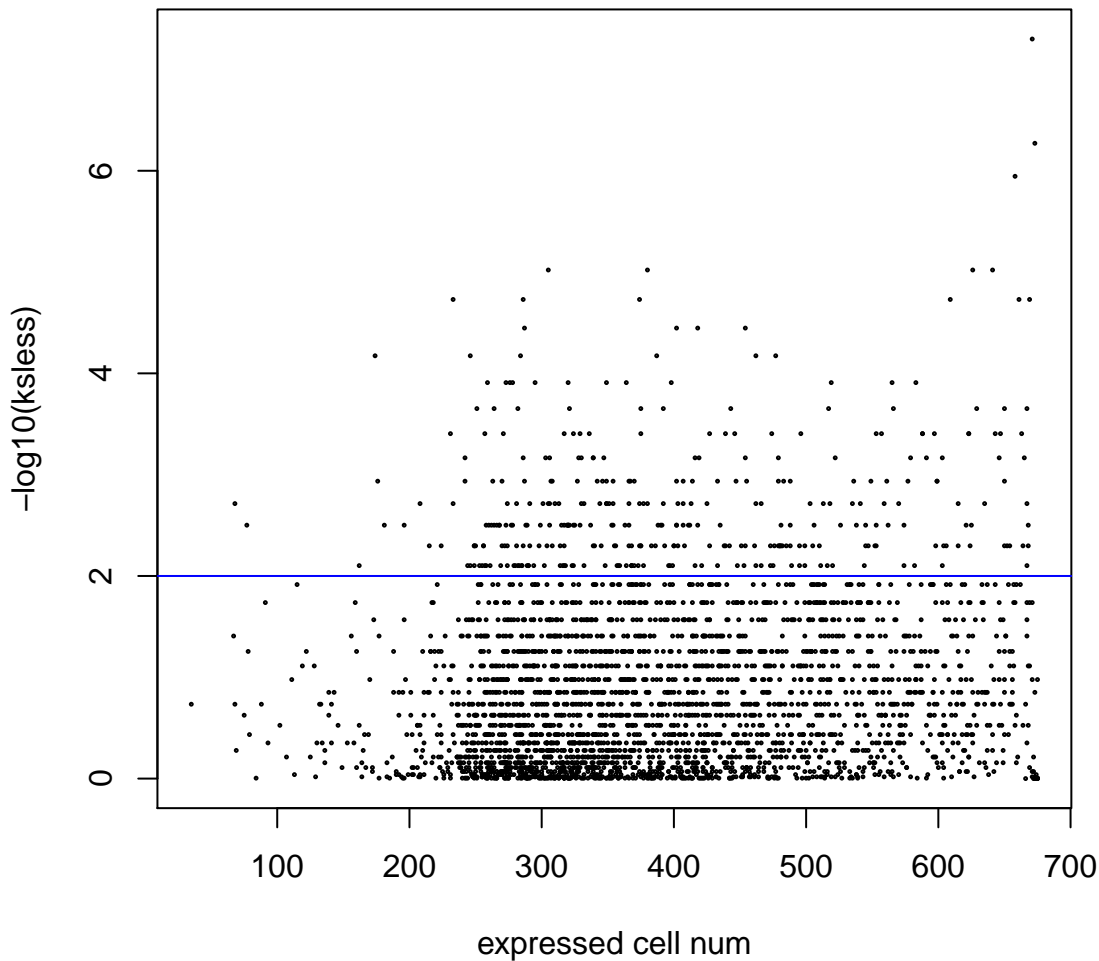
sig_KStwoside: 8.005%



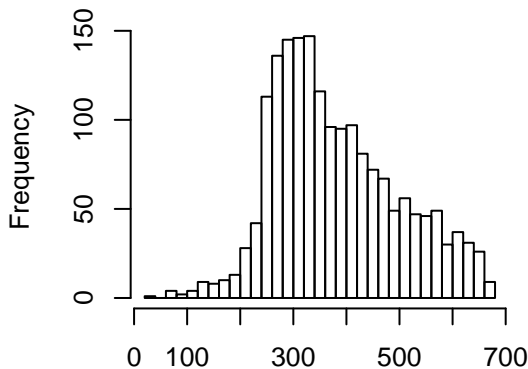
sig_KSgreater: 1.201%



sig_KSless: 11.508%

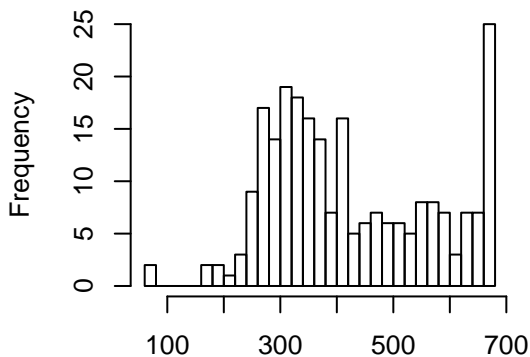


expression cell num,kstwoside>0.2



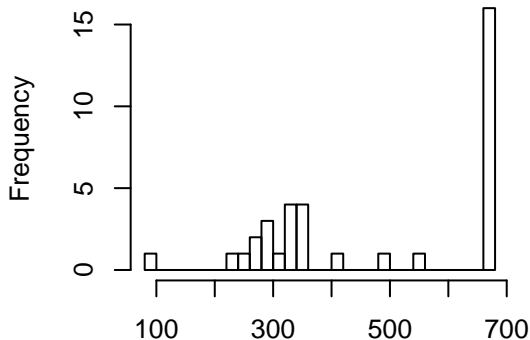
rawM_0zero_num[kstwoside > 0.2]

expression cell num,kstwoside<0.0



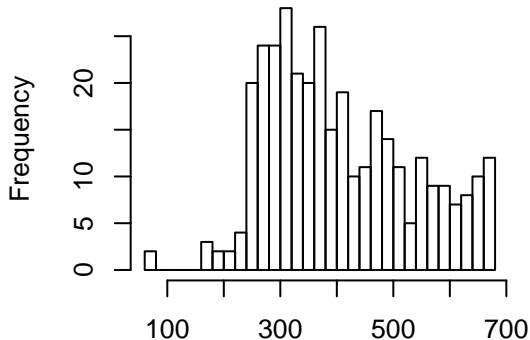
rawM_0zero_num[kstwoside < 0.01]

expression cell num,ksgreater<0.0



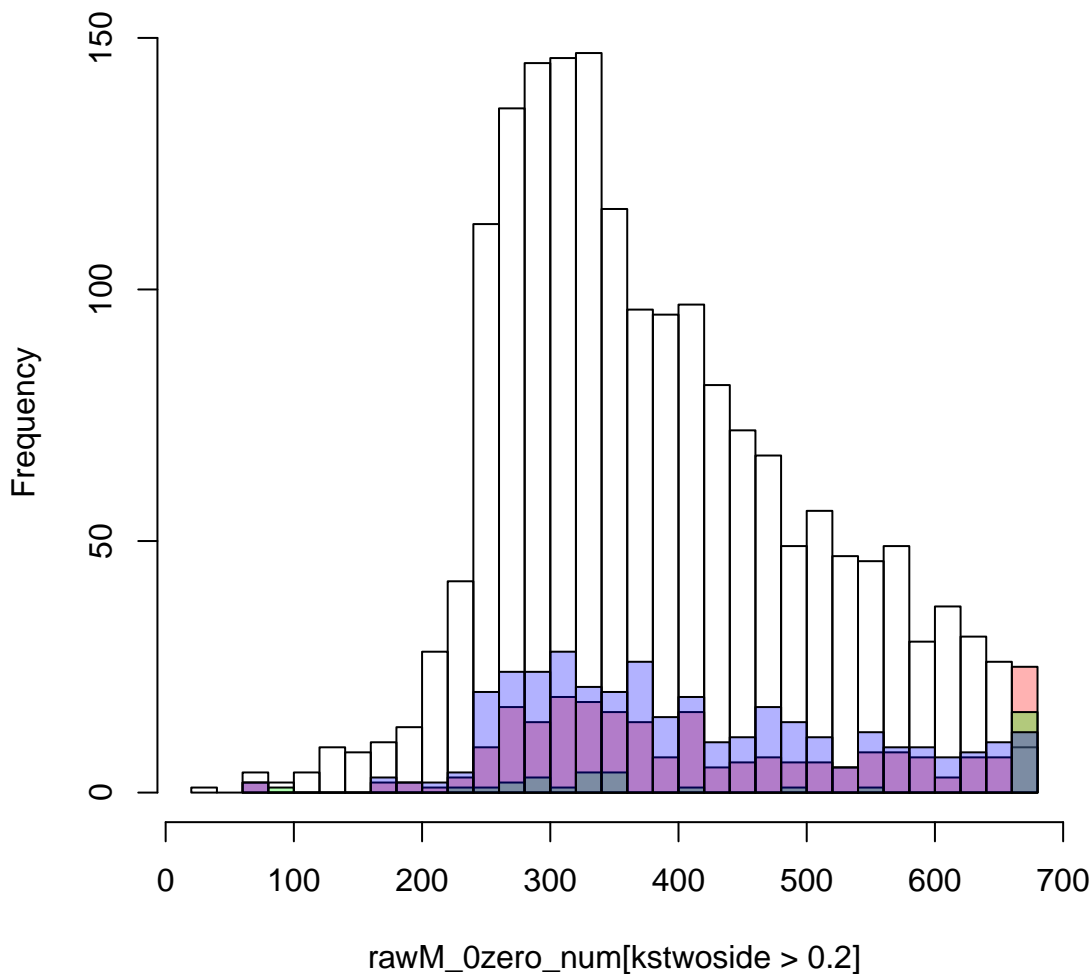
rawM_0zero_num[ksgreater < 0.01]

expression cell num,ksless<0.01

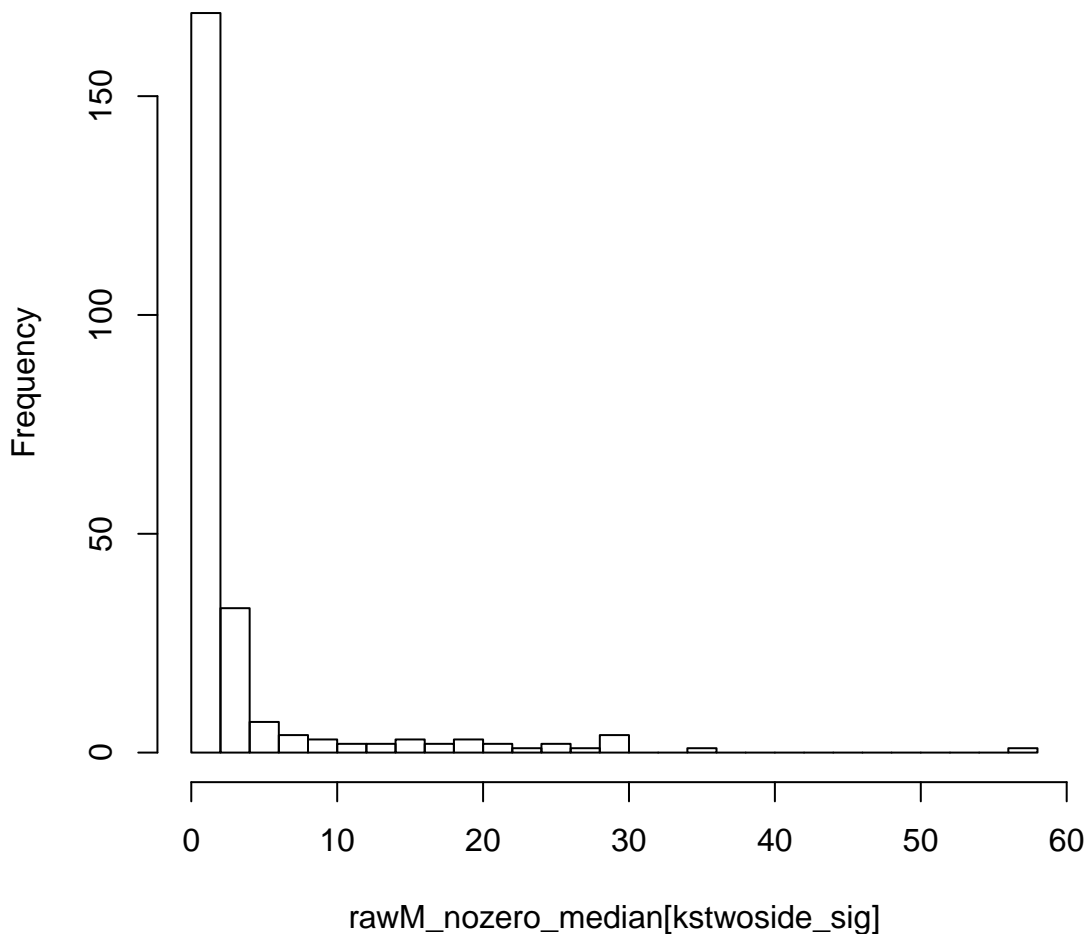


rawM_0zero_num[ksless < 0.01]

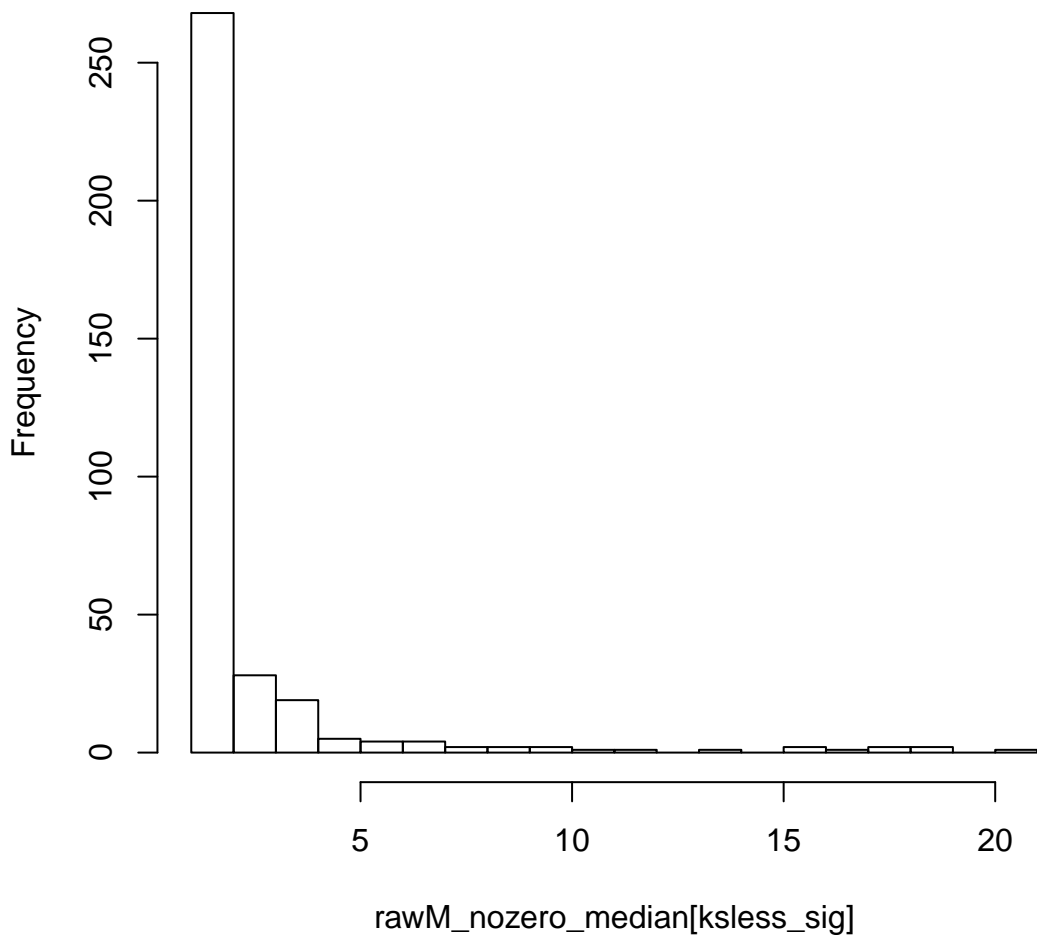
expression cell num



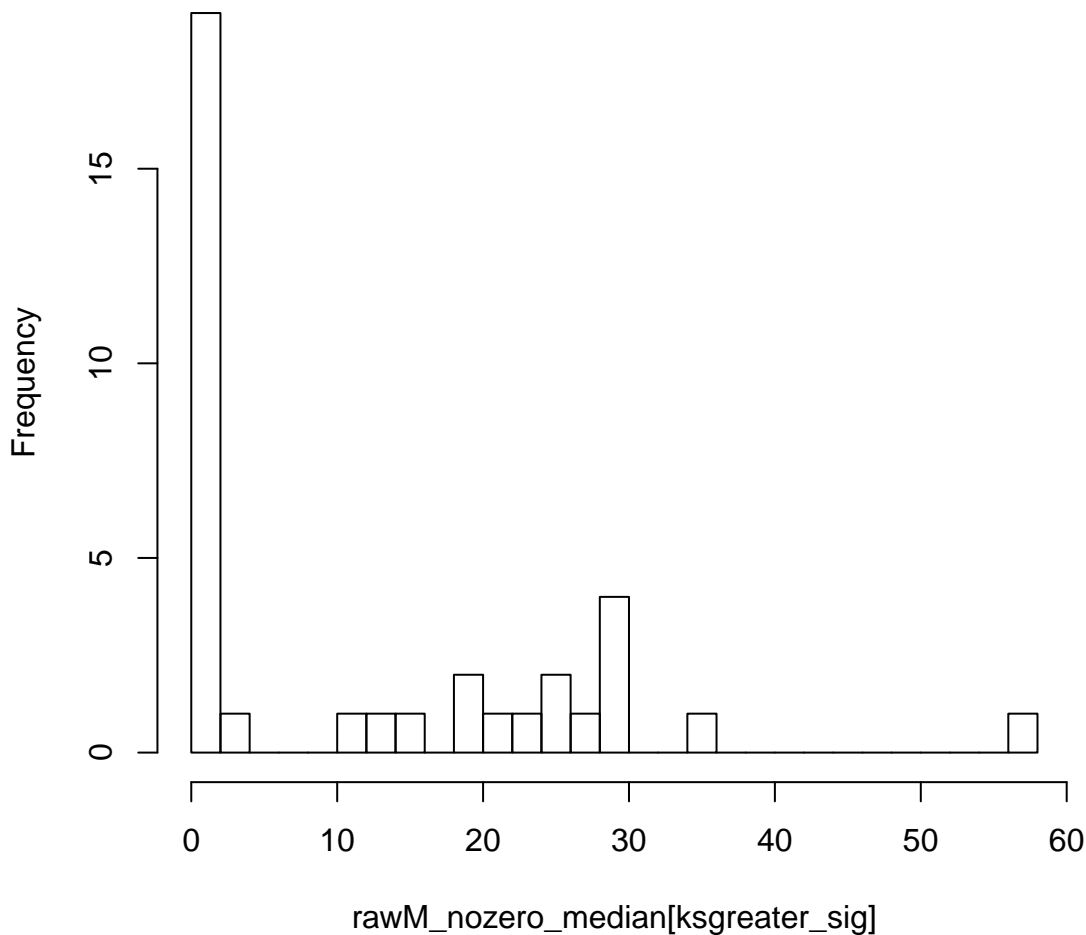
median of nozero log-express of genes, kstwoside sig



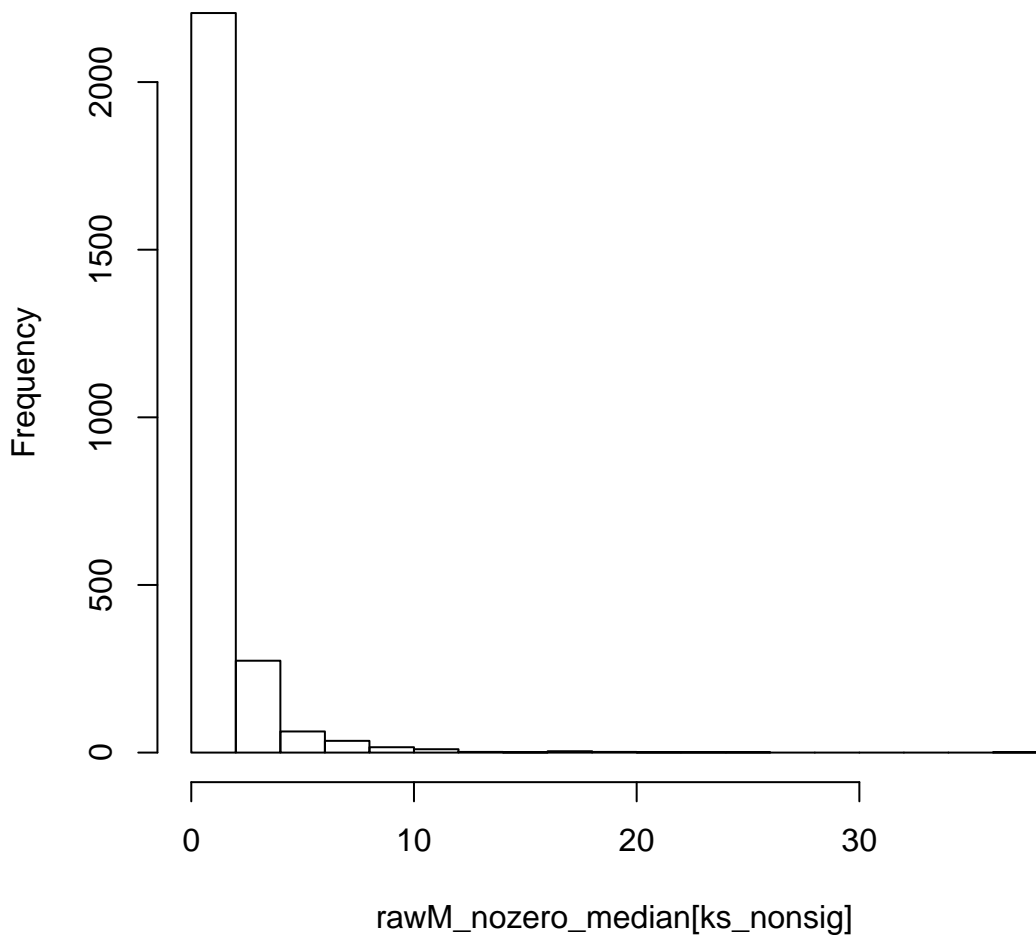
median of nozero log-express of genes, ksless sig



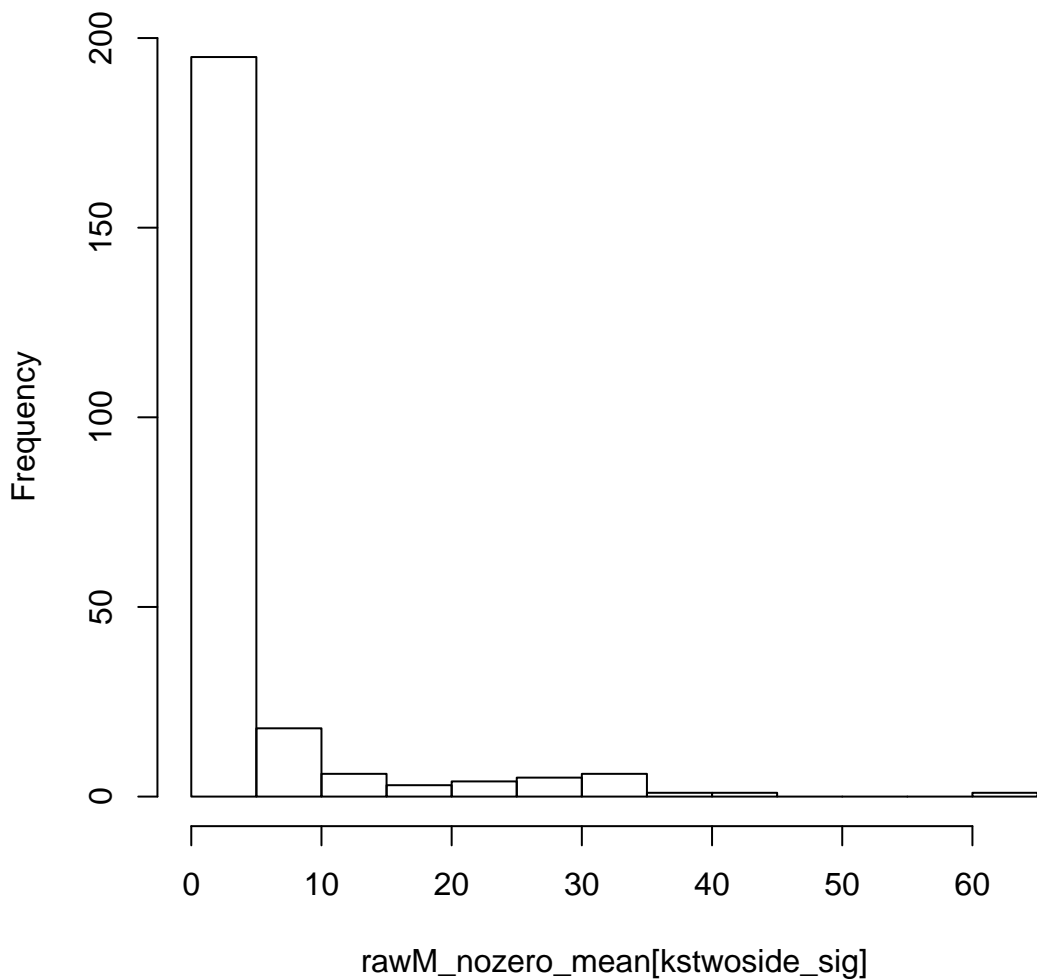
median of nozero log-express of genes,ksgreater sig



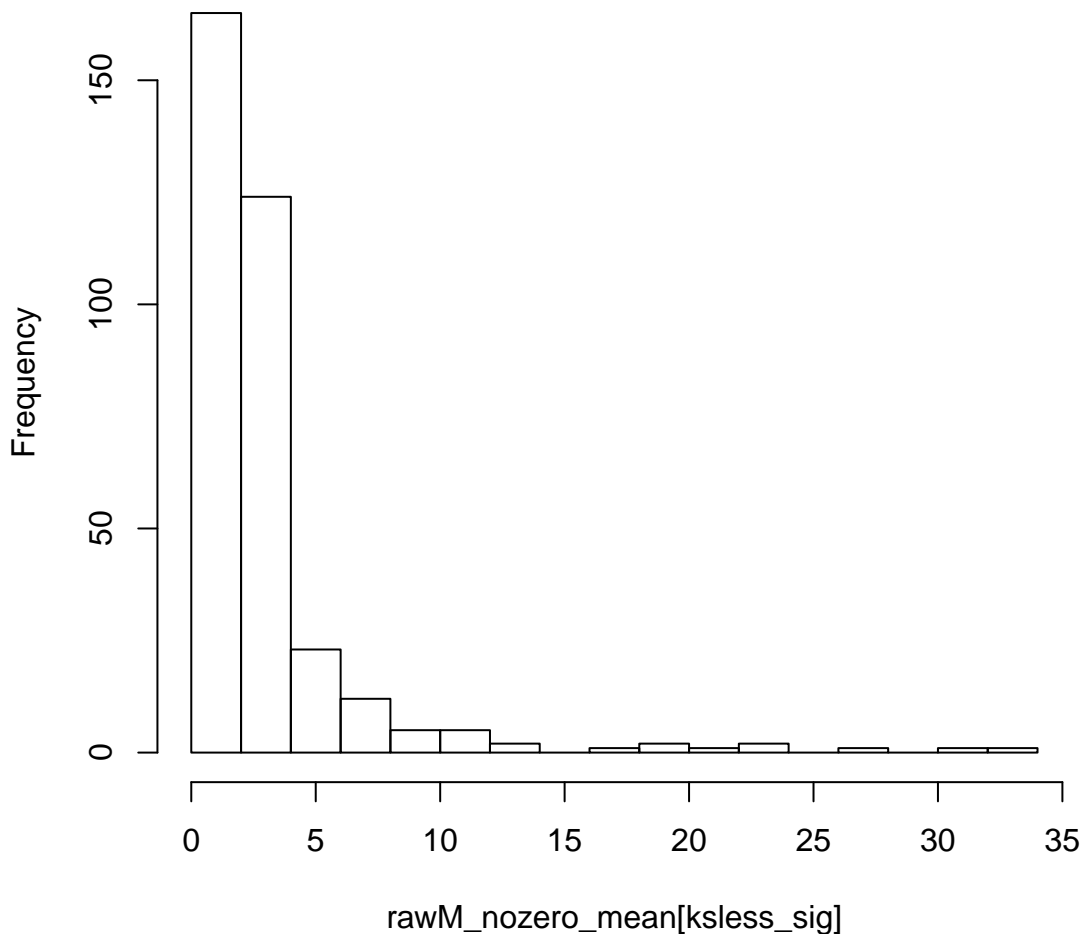
median of nozero log-express of genes,ks no sig



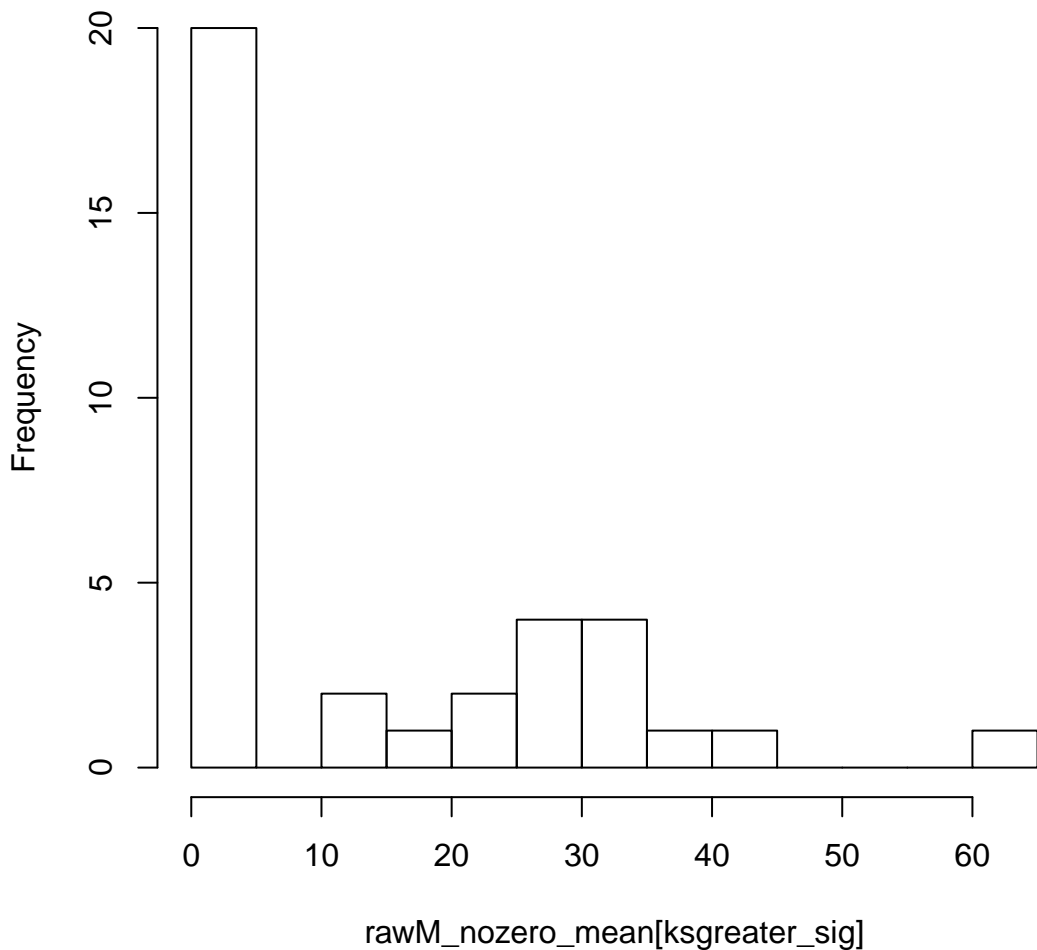
mean of nozero log-express of genes, kstwoside sig



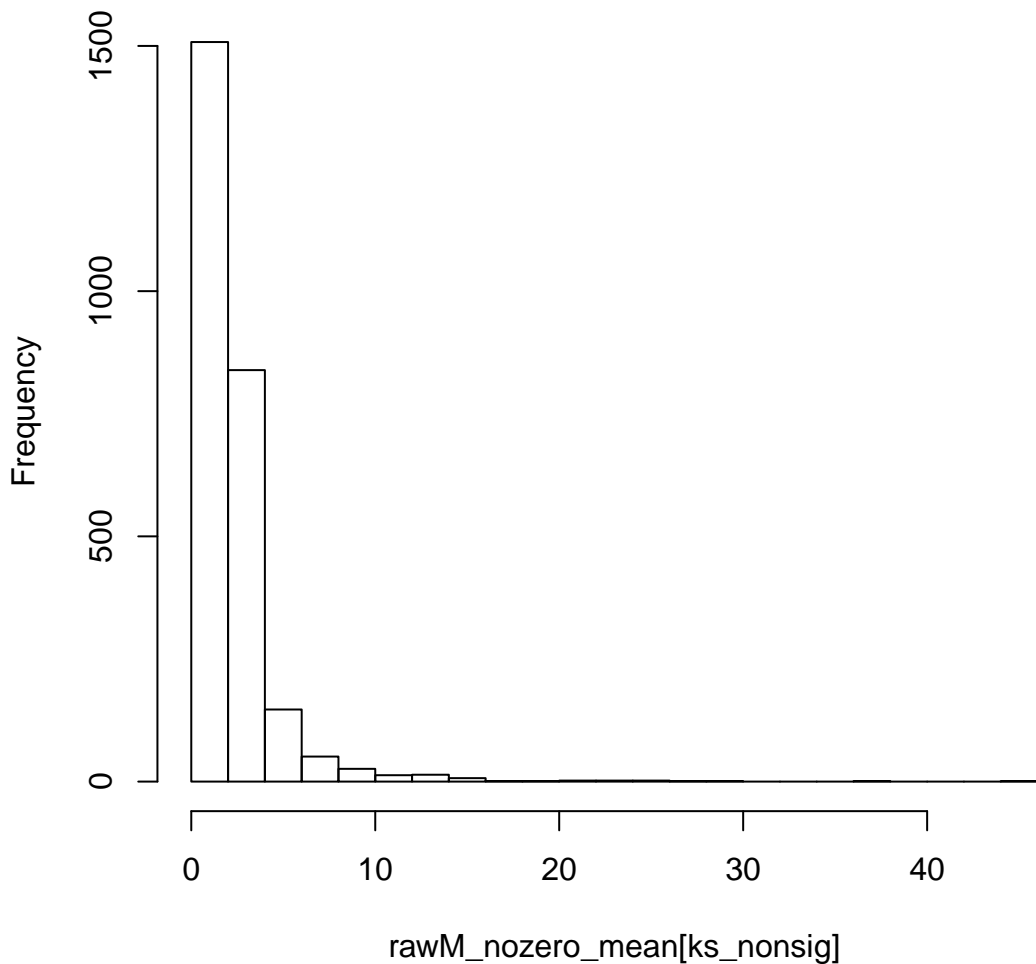
mean of nozero log-express of genes, ksless sig



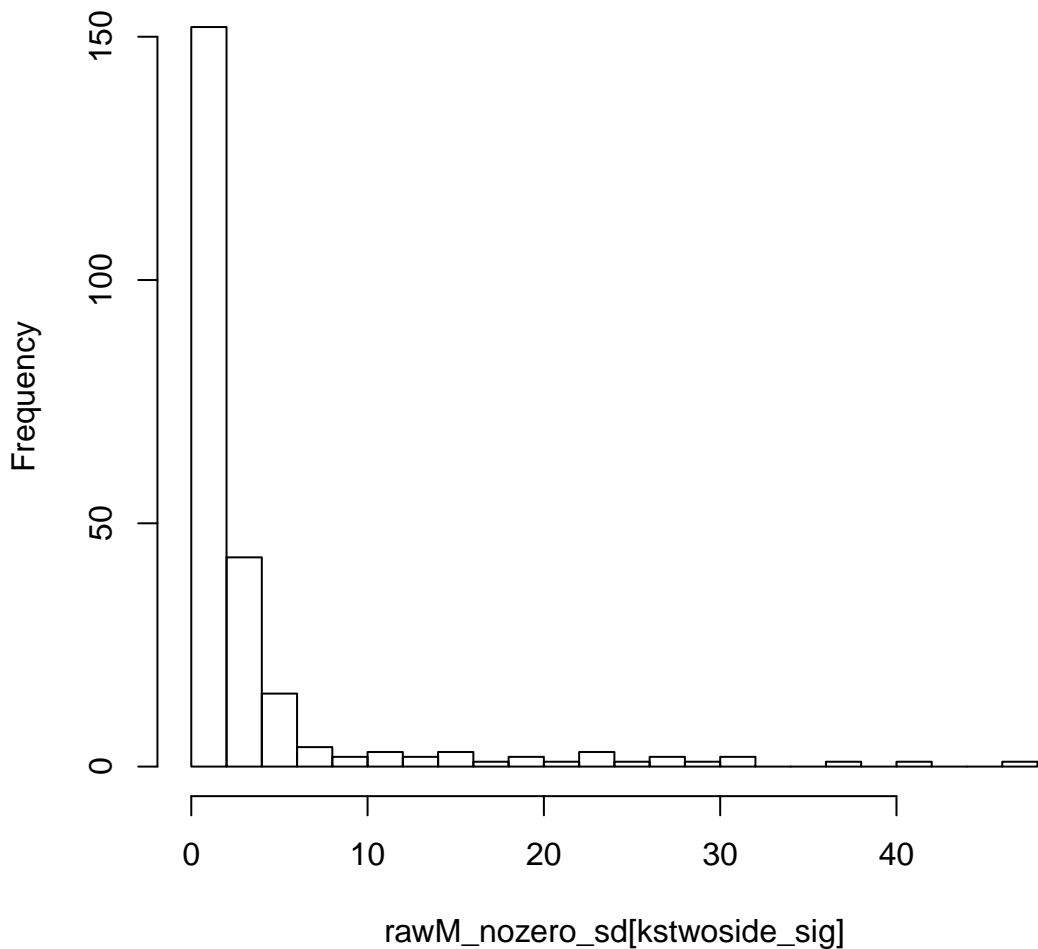
mean of nozero log-express of genes,ksgreater sig



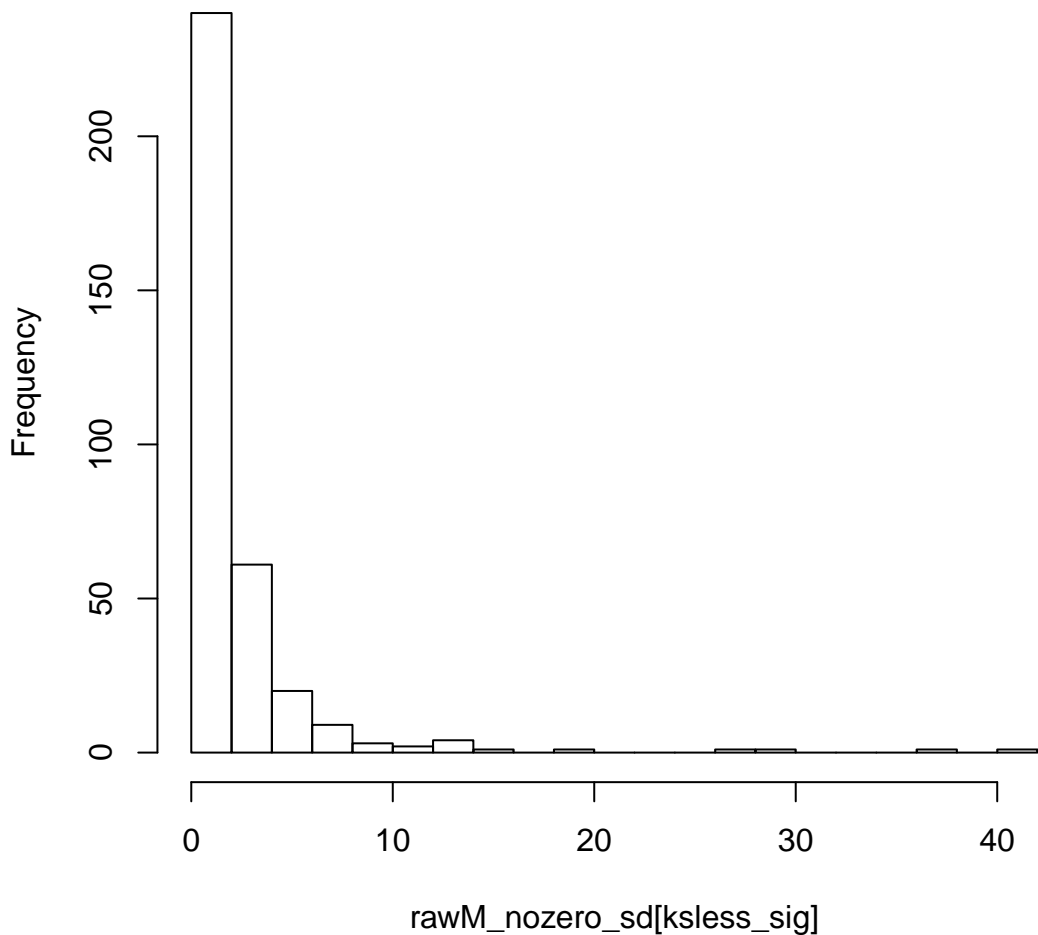
mean of nozero log-expres of genes,ks no sig



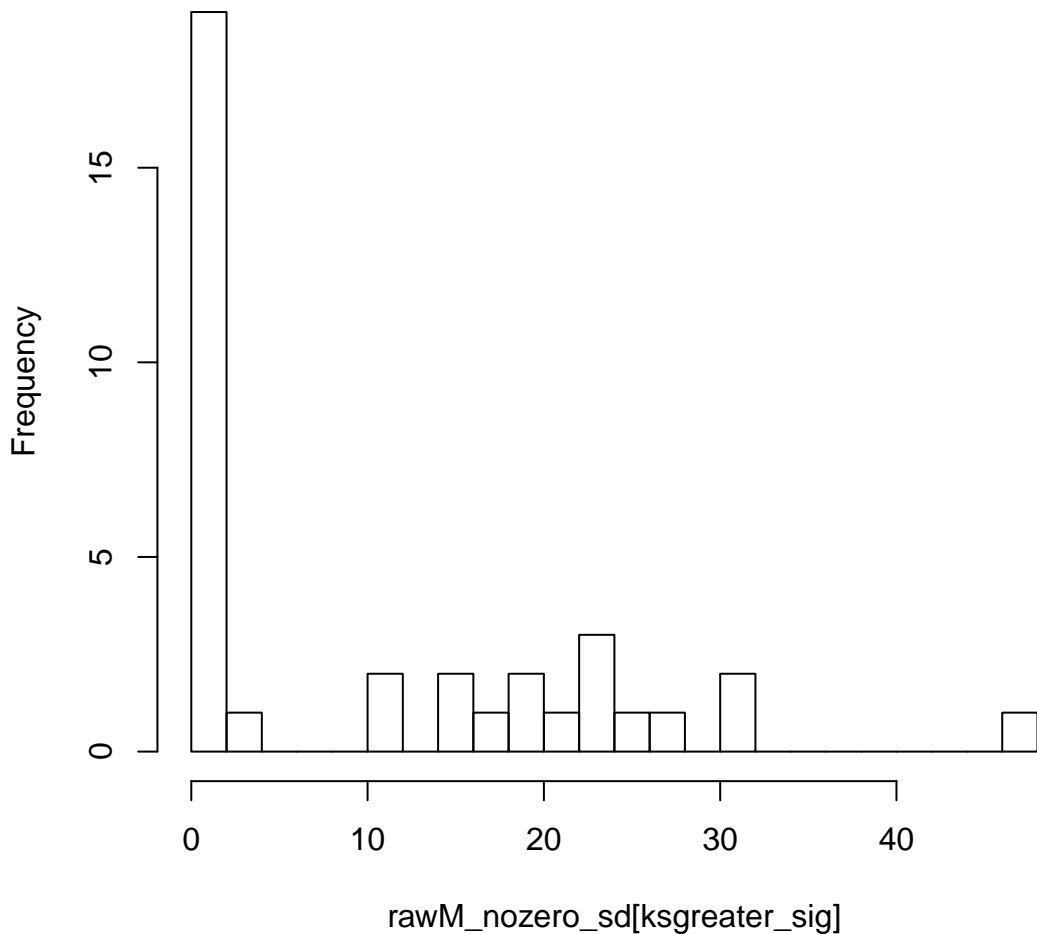
sd of nozero log-express of genes, kstwoside sig



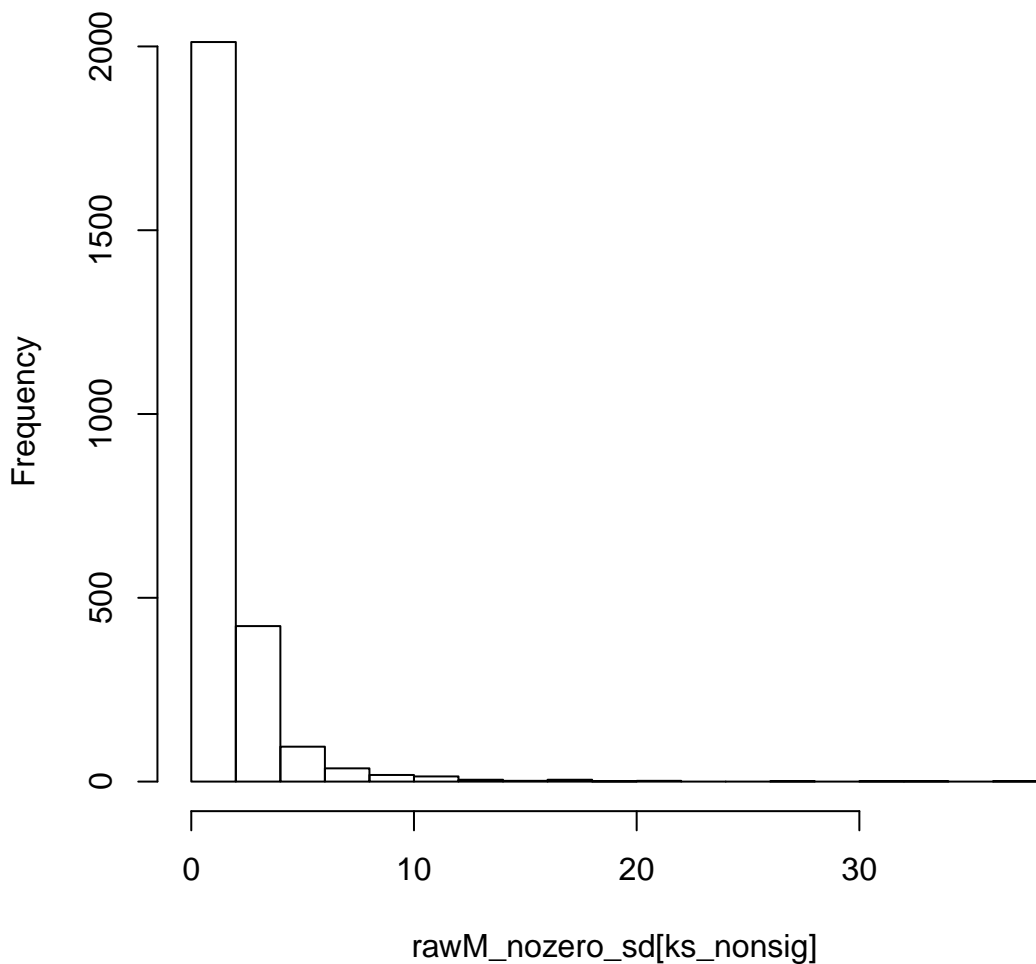
sd of nozero log-express of genes, ksless sig



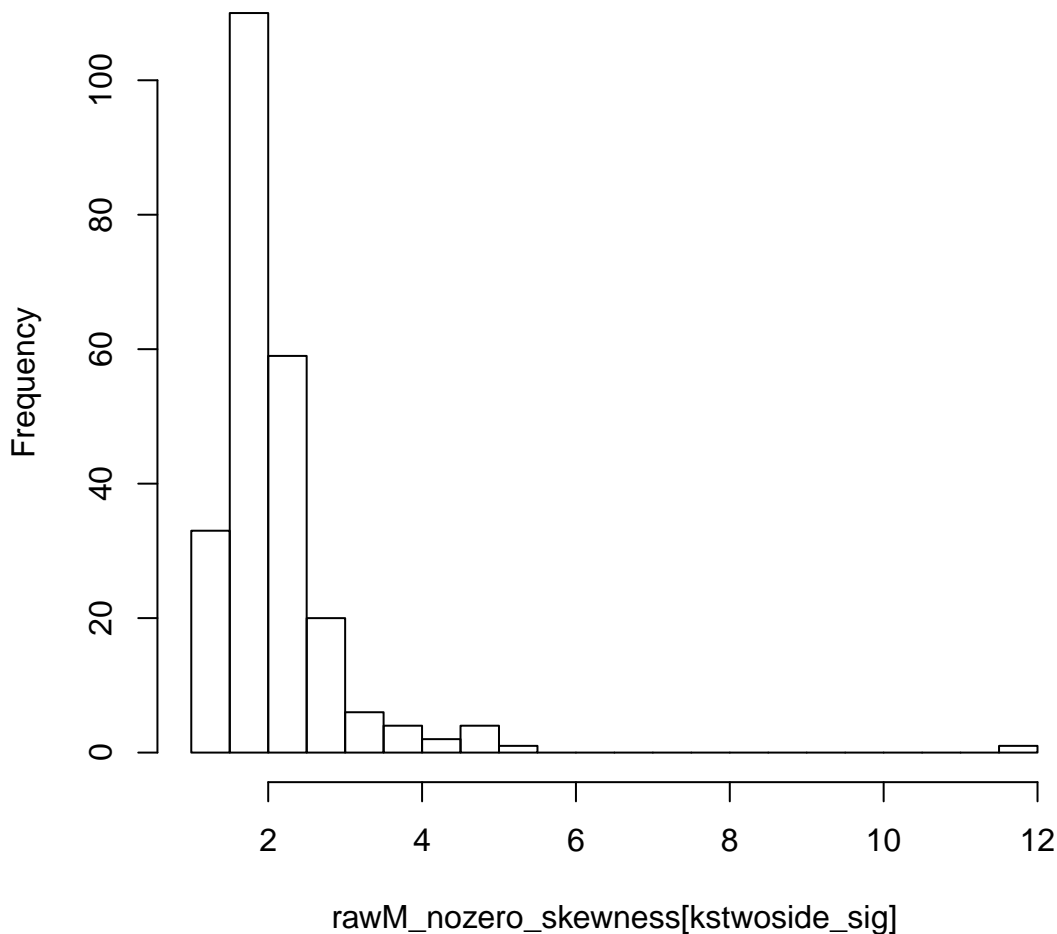
sd of nozero log-express of genes,ksgreater sig



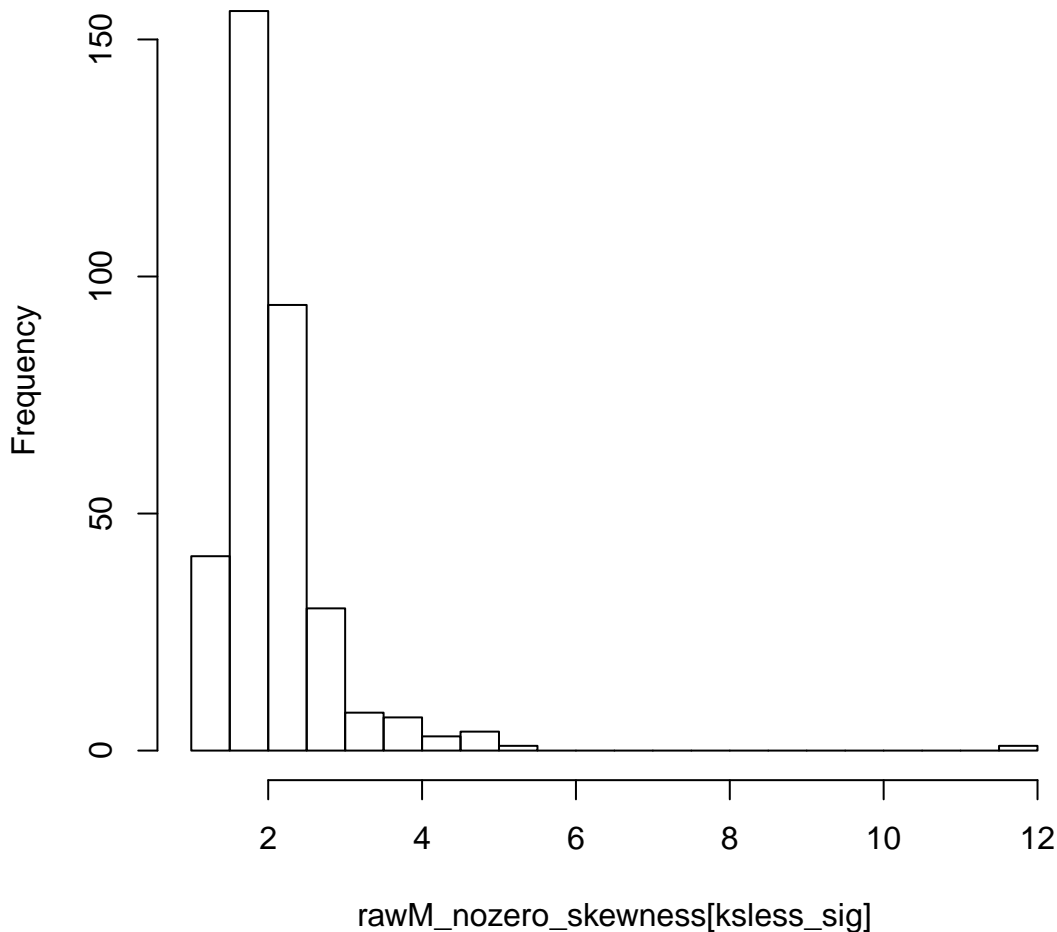
sd of nozero log-express of genes,ks no sig



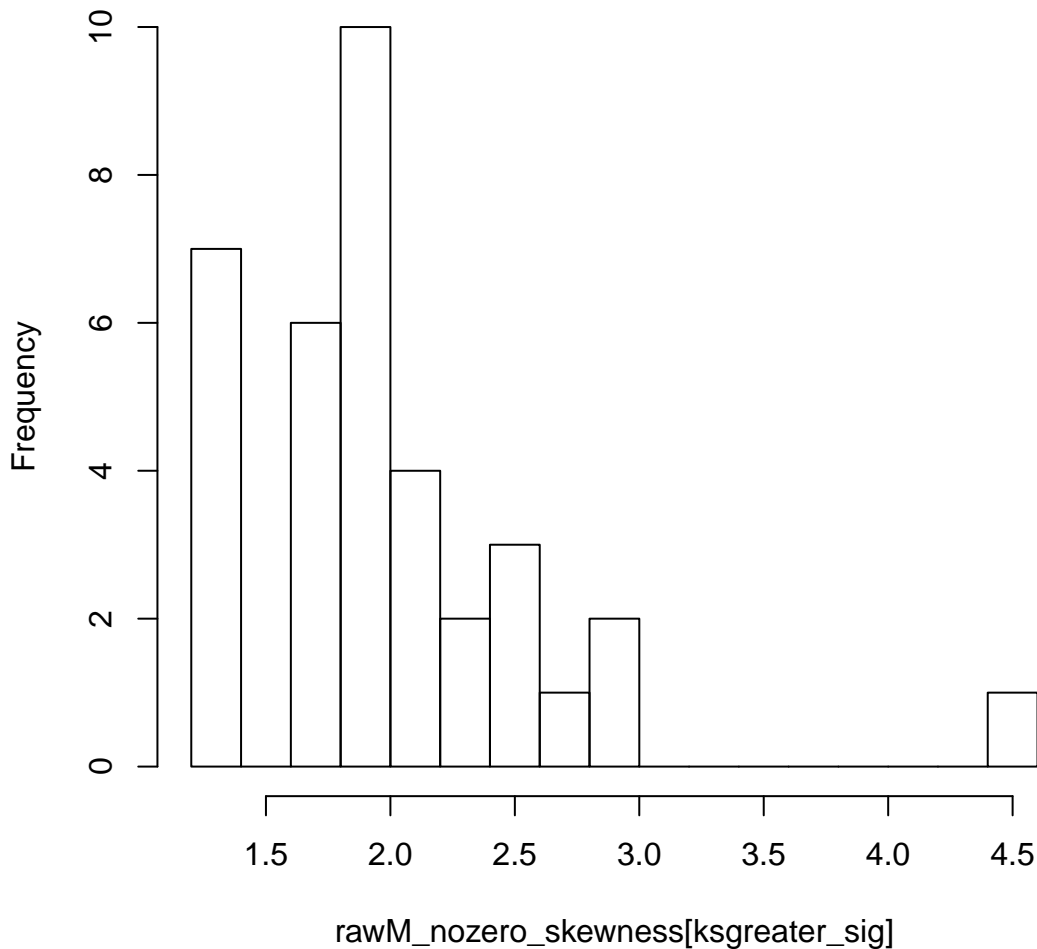
skewness of nozero log-express of genes, kstwoside sig



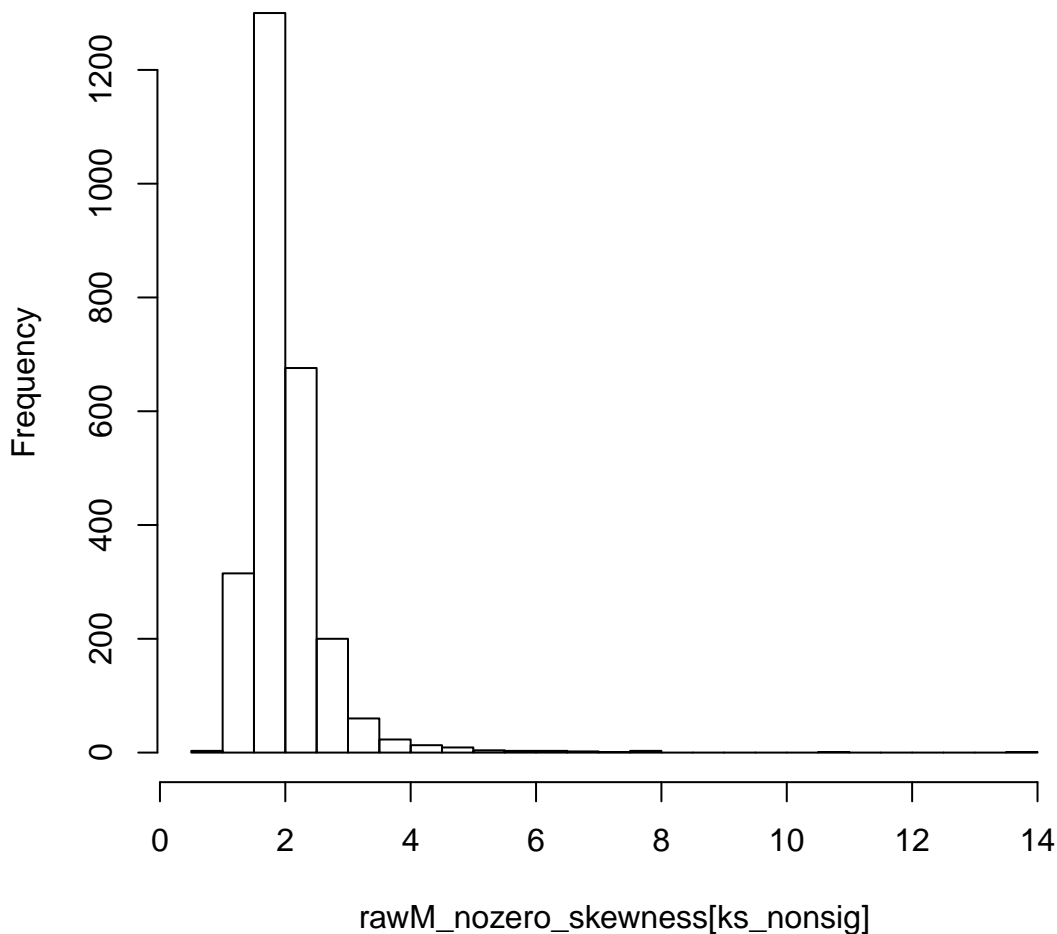
skewness of nozero log-express of genes, ksless sig



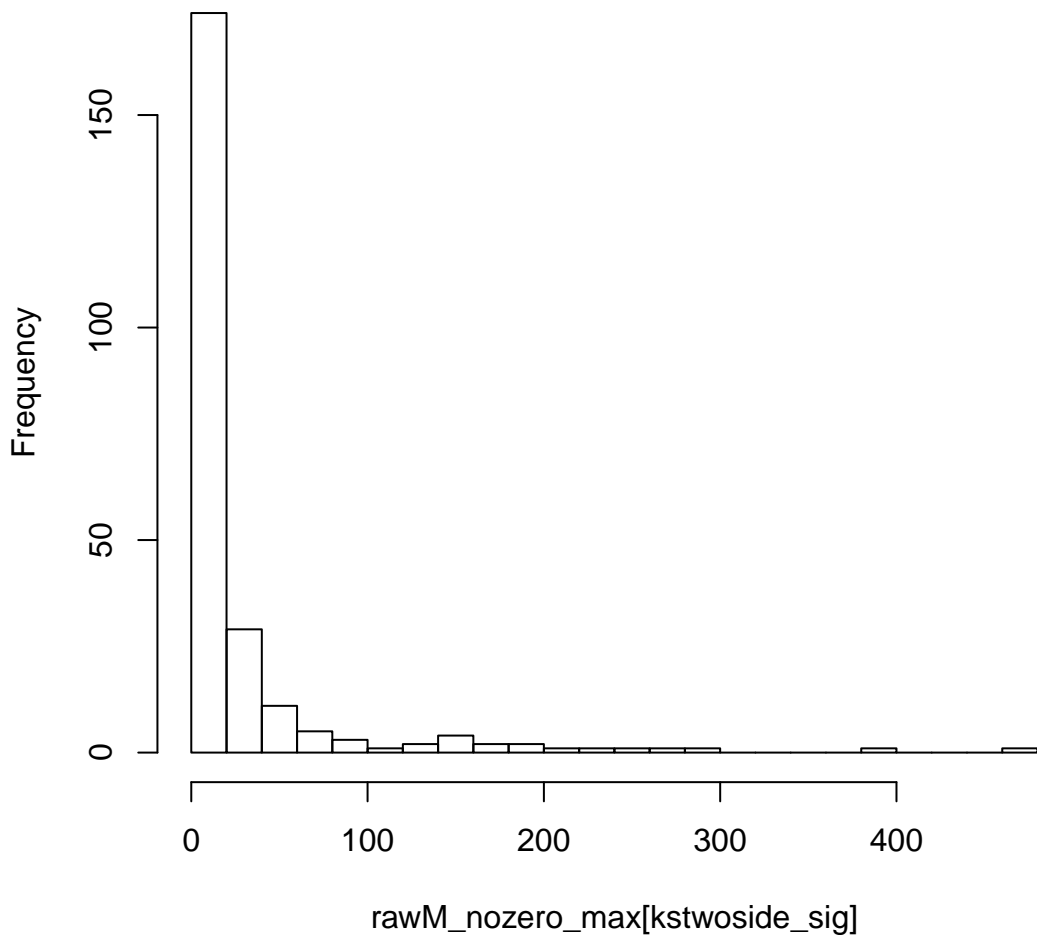
skewness of nozero log-express of genes,ksgreater sig



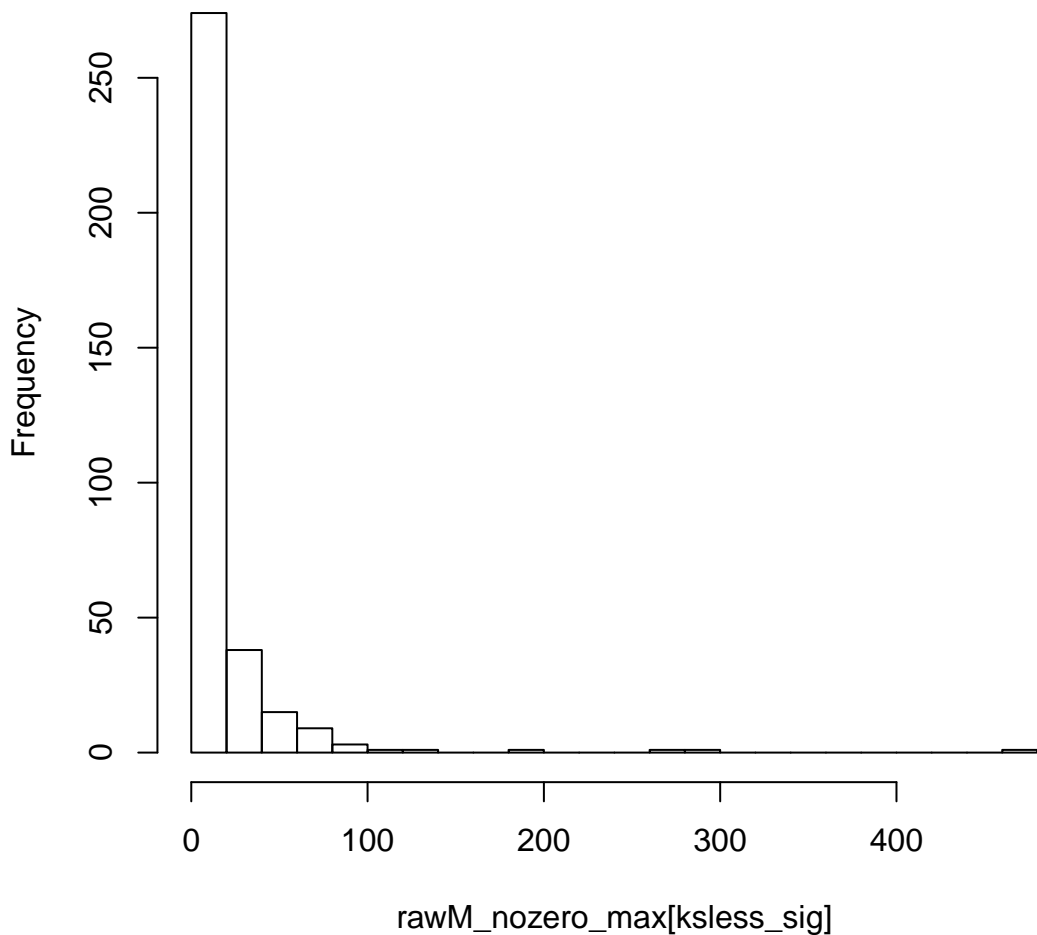
skewness of nozero log-express of genes,ks no sig



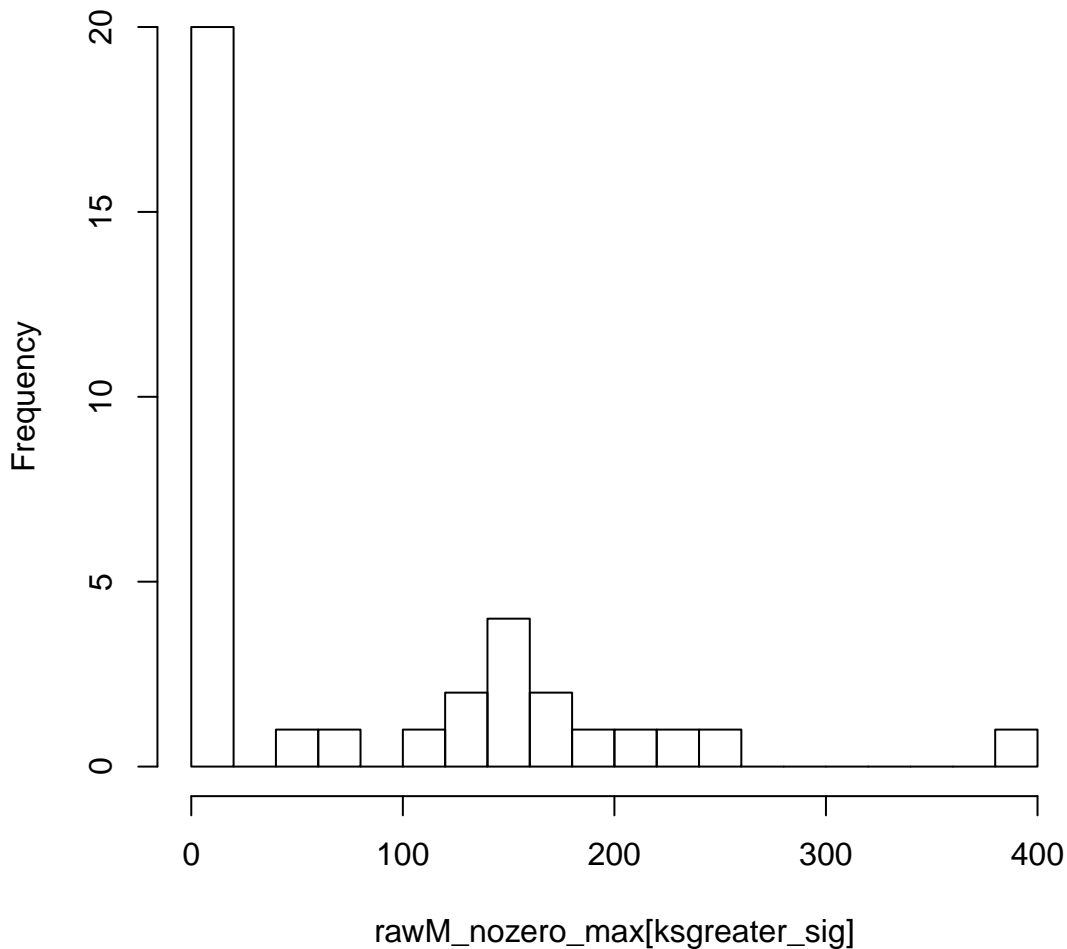
max of nozero log-express of genes, kstwside sig



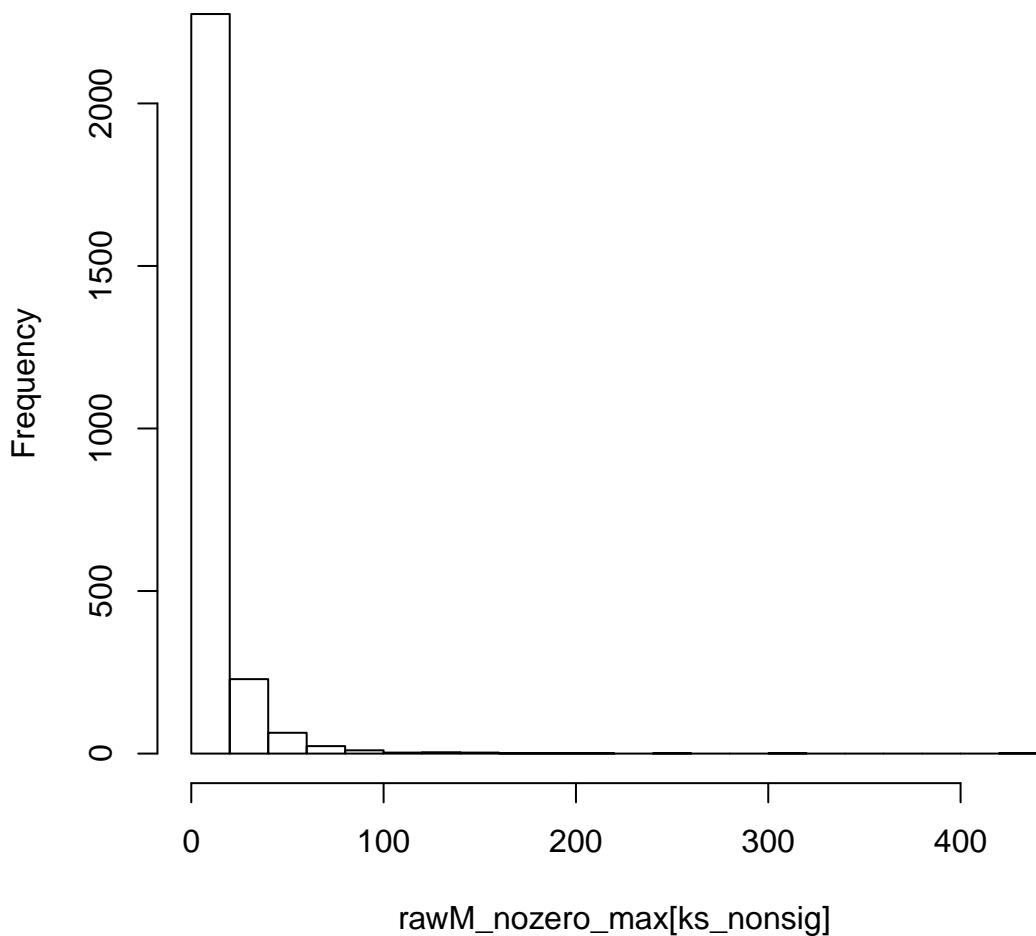
max of nozero log-express of genes, ksless sig



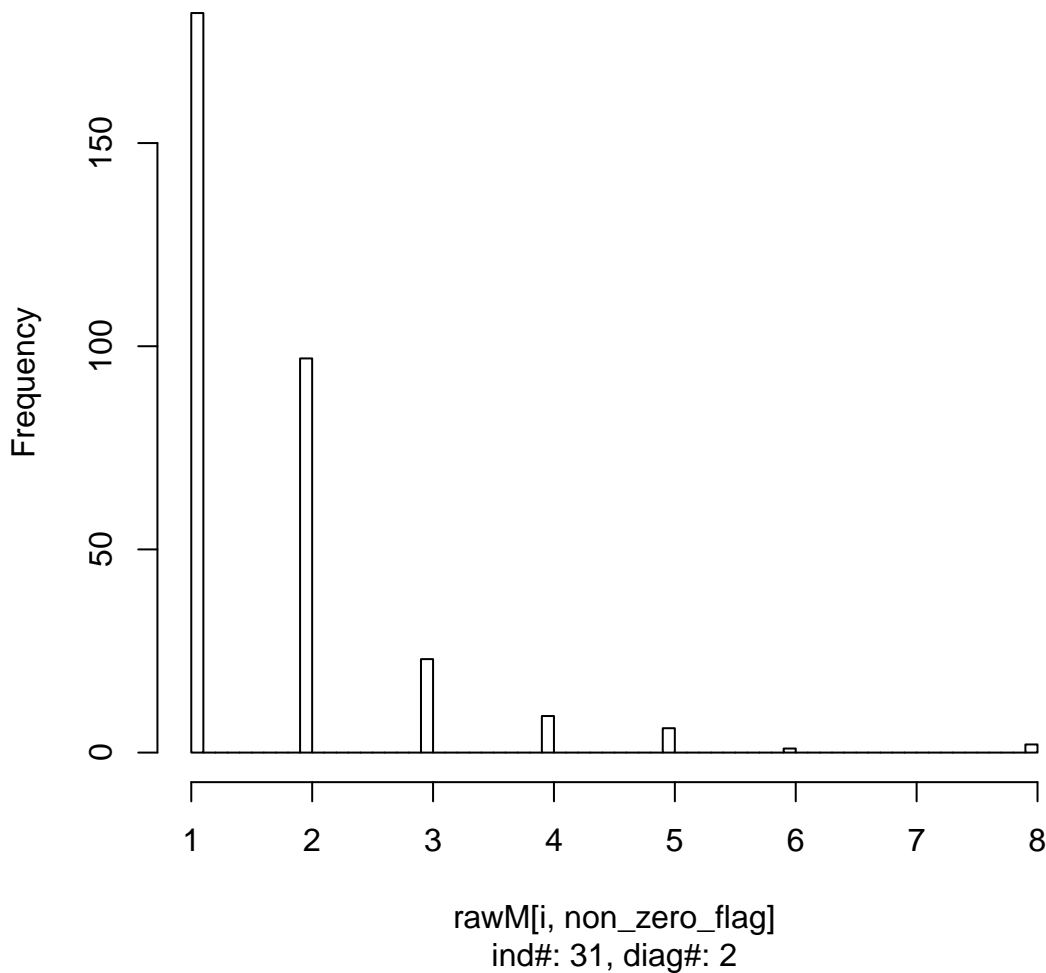
max of nozero log-express of genes,ksgreater sig



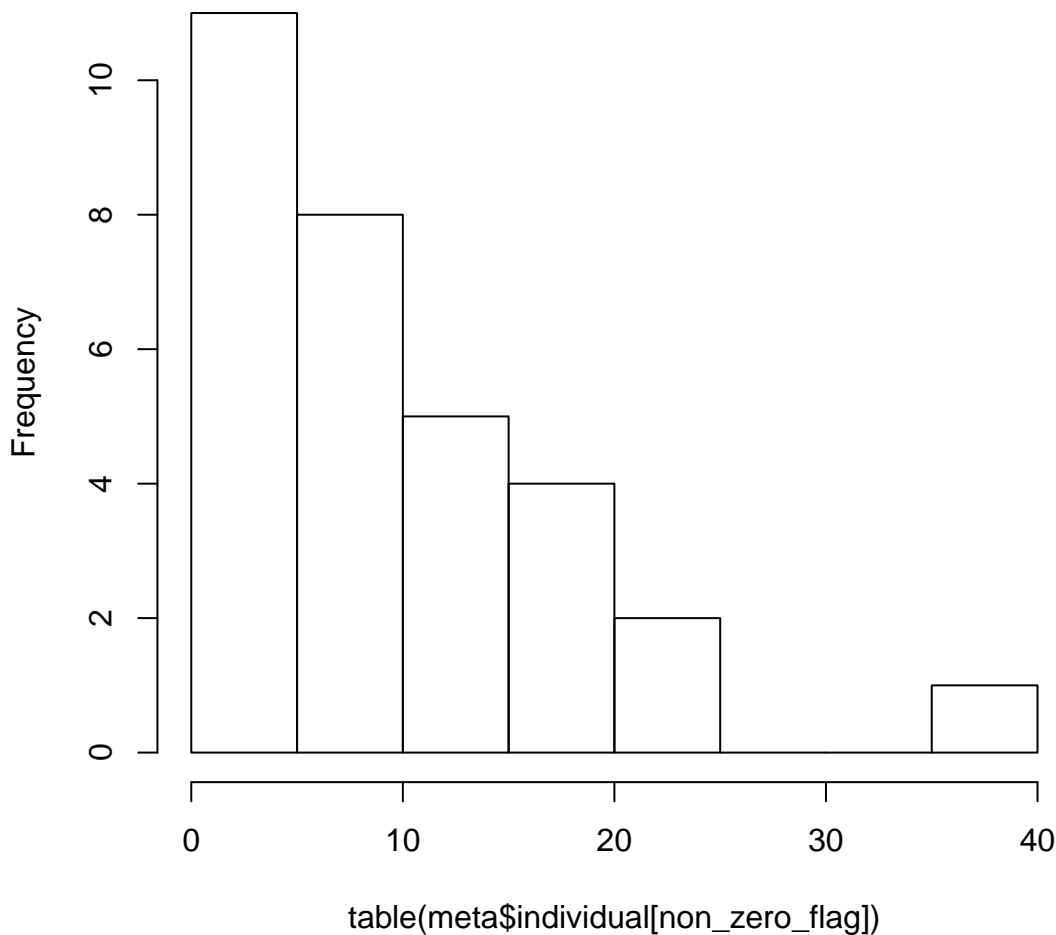
max of nozero log-expres of genes,ks no sig



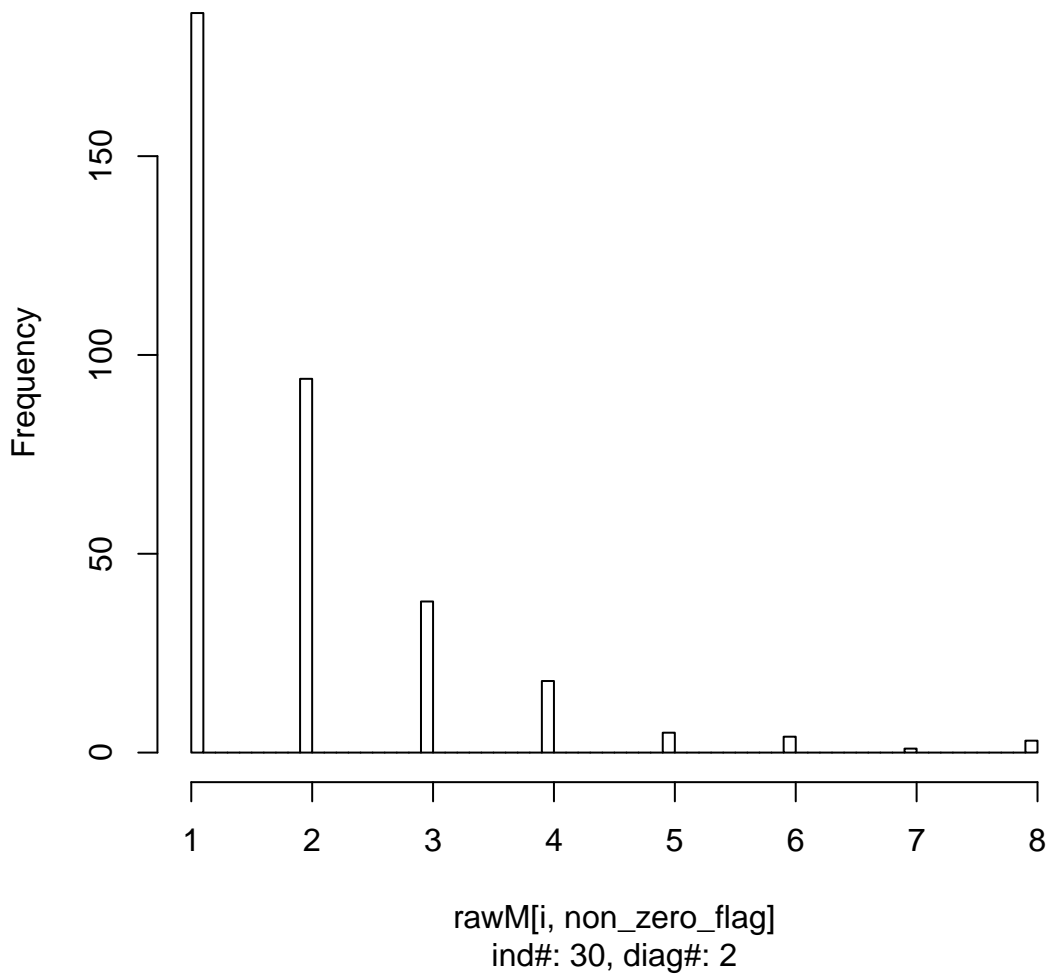
less sig: log expression of gene#2, pval ob=0.3084, non-zero nu



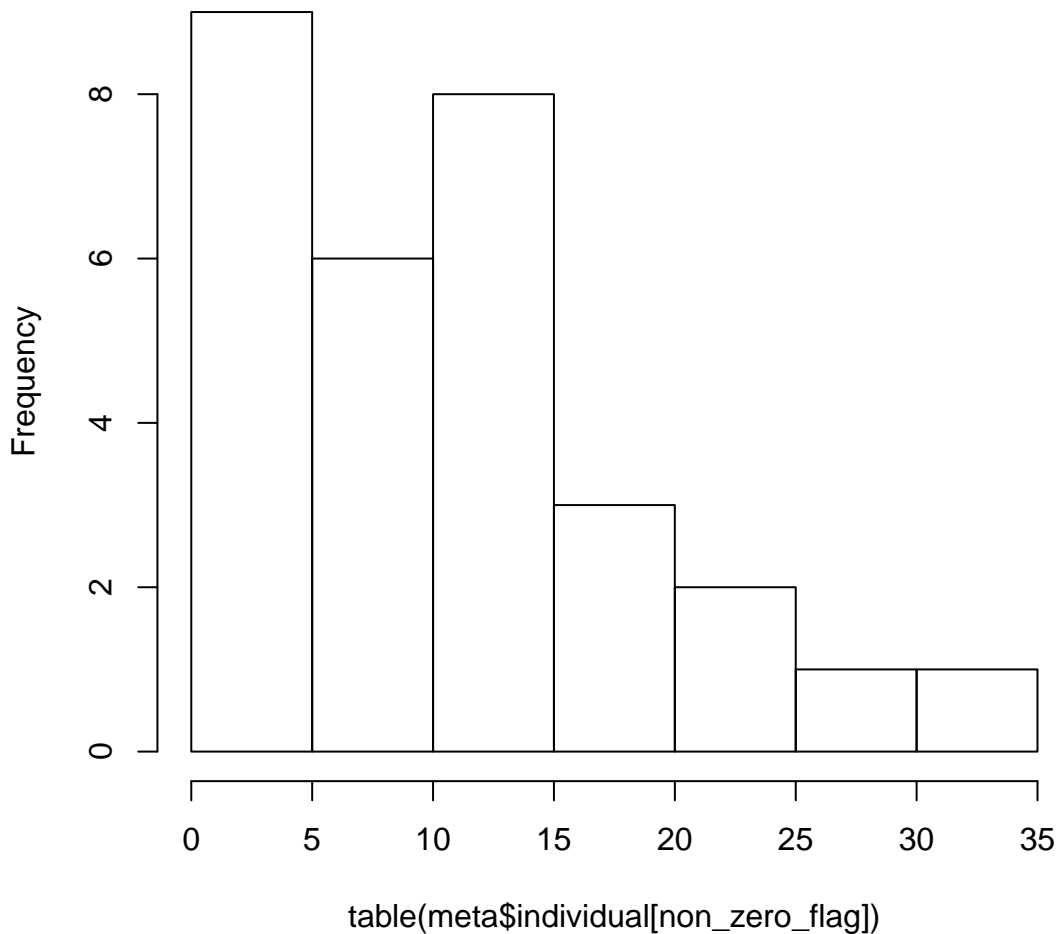
KSless sig: individual expression cell count of gene#2



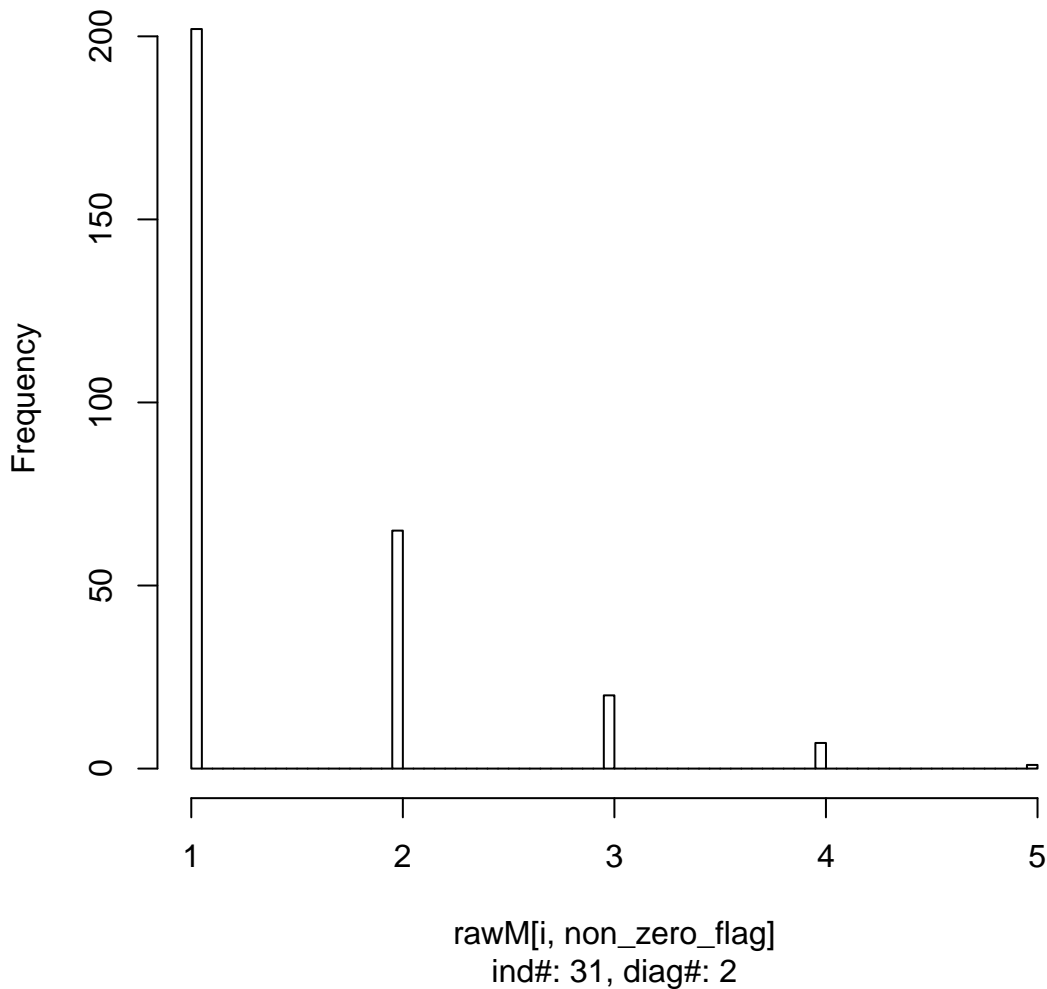
less sig: log expression of gene#10, pval ob=0.543, non-zero nu



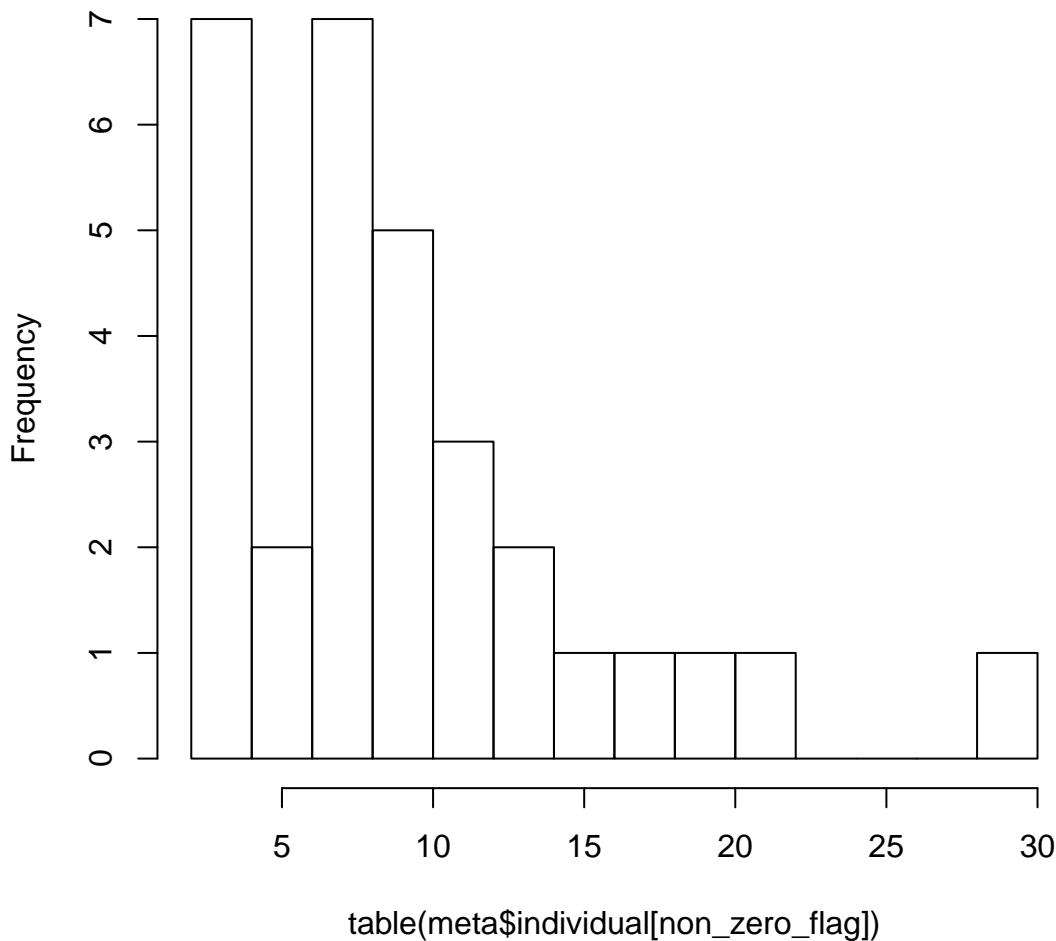
KSless sig: individual expression cell count of gene#10



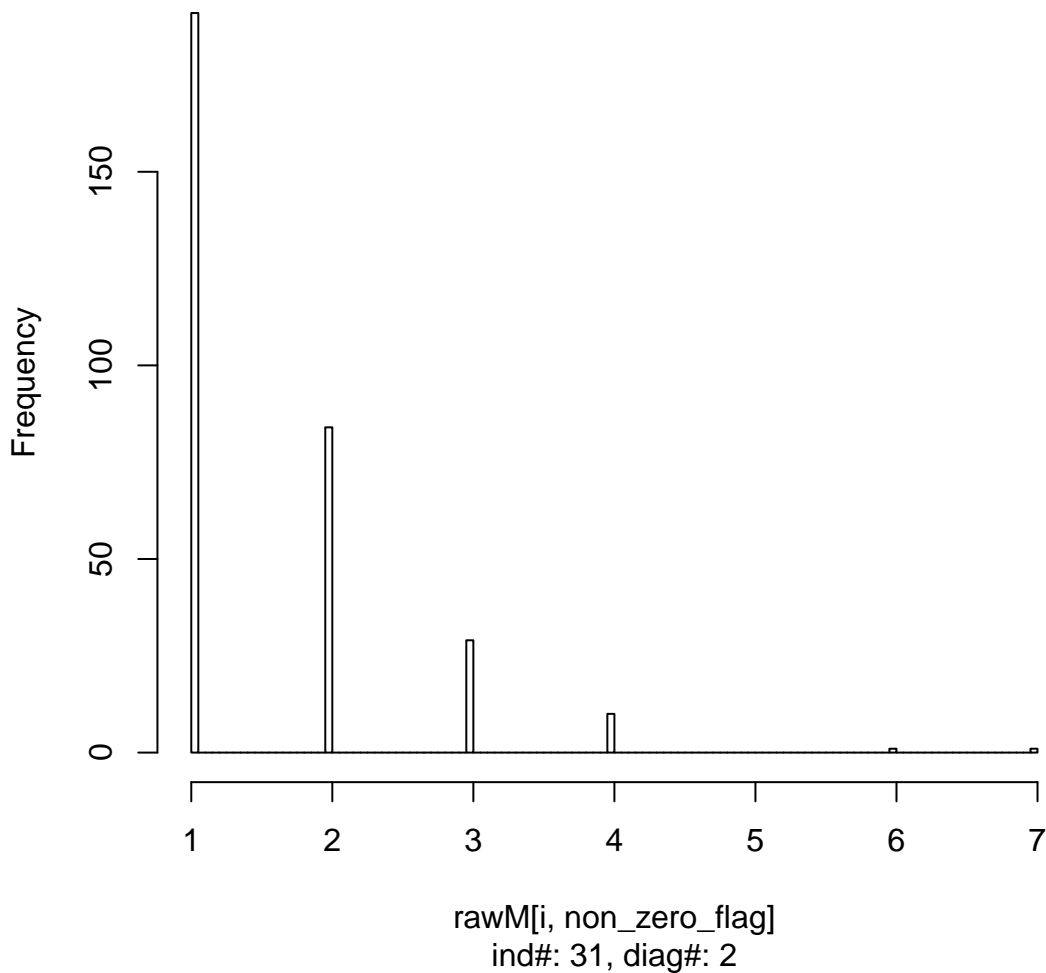
less sig: log expression of gene#14, pval ob=0.5456, non-zero nu



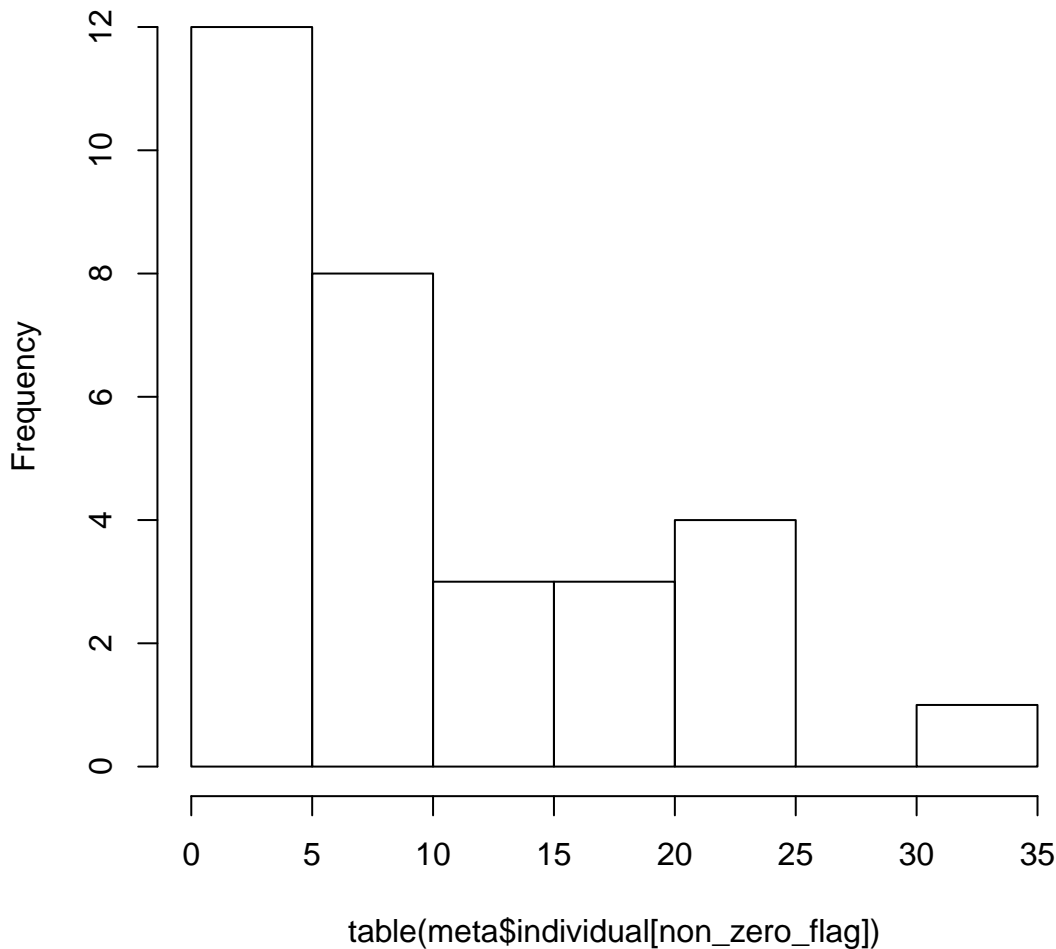
KSless sig: individual expression cell count of gene#14



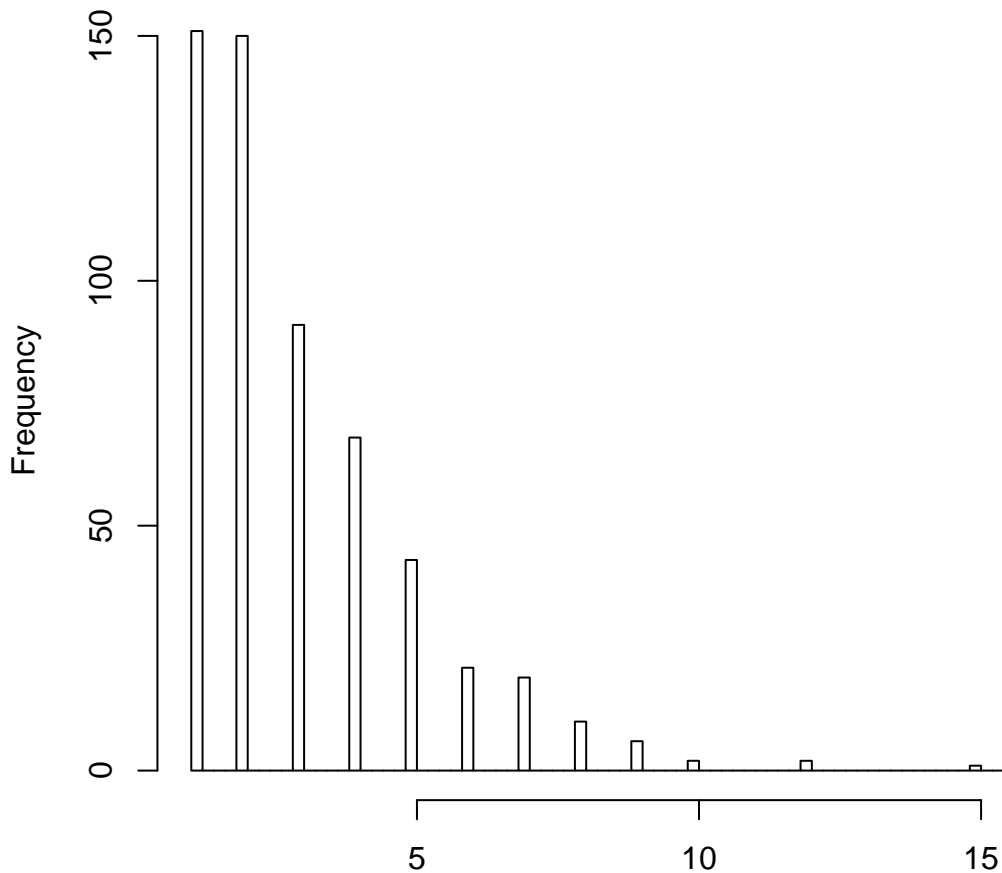
less sig: log expression of gene#22, pval ob=0.7475, non-zero nu



KSless sig: individual expression cell count of gene#22

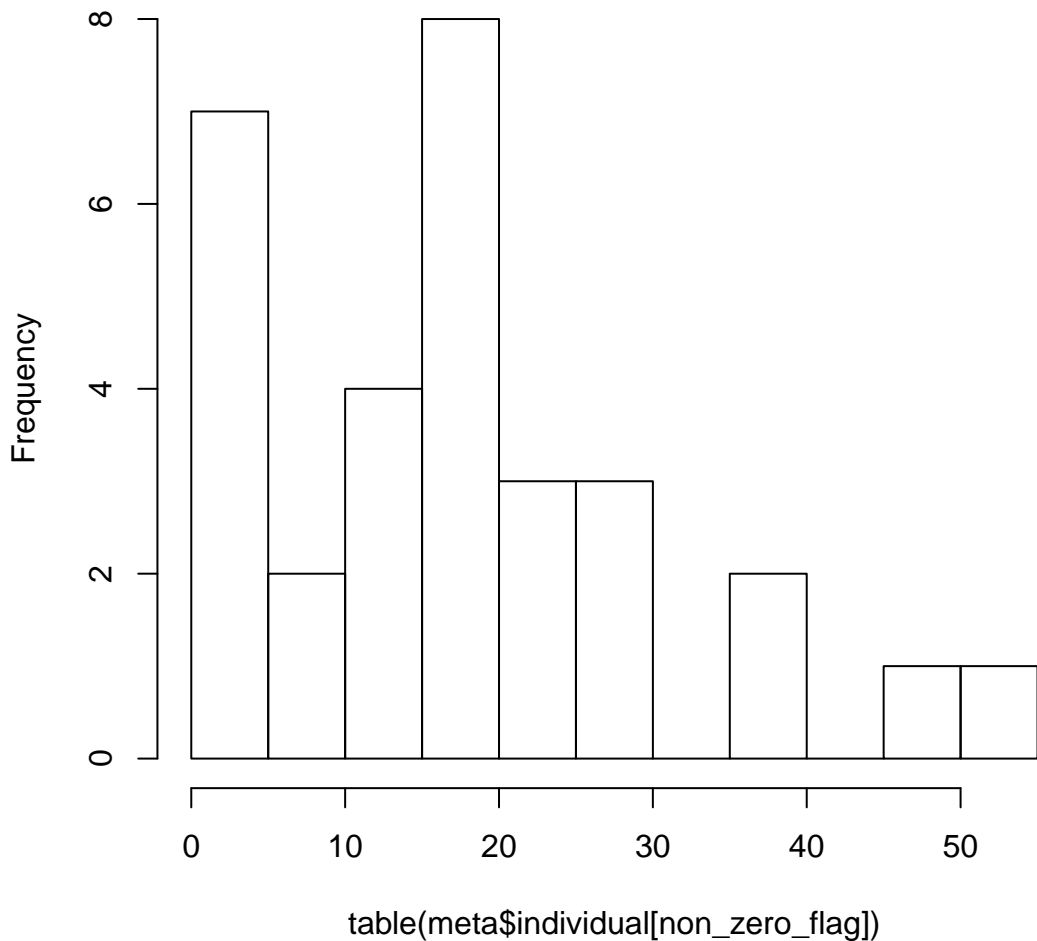


less sig: log expression of gene#42, pval ob=0.6029, non-zero nu

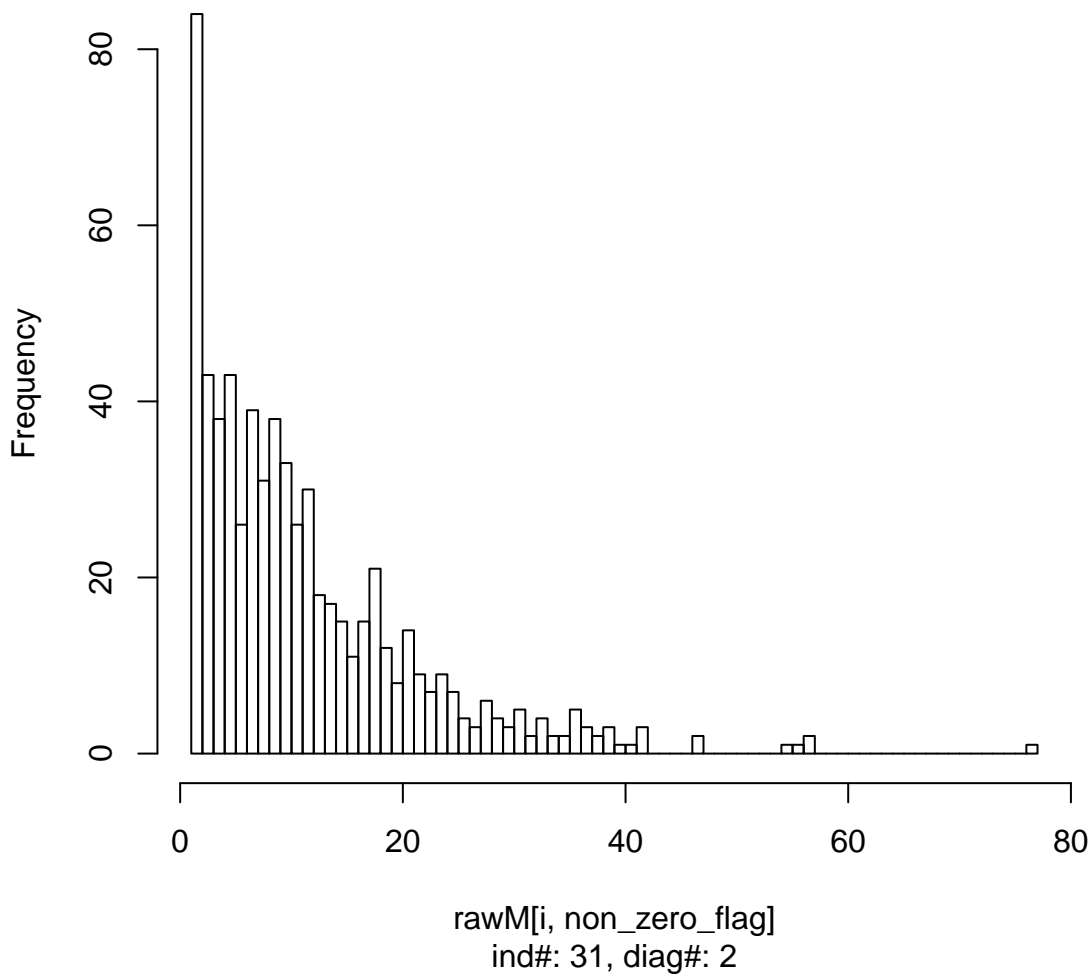


rawM[i, non_zero_flag]
ind#: 31, diag#: 2

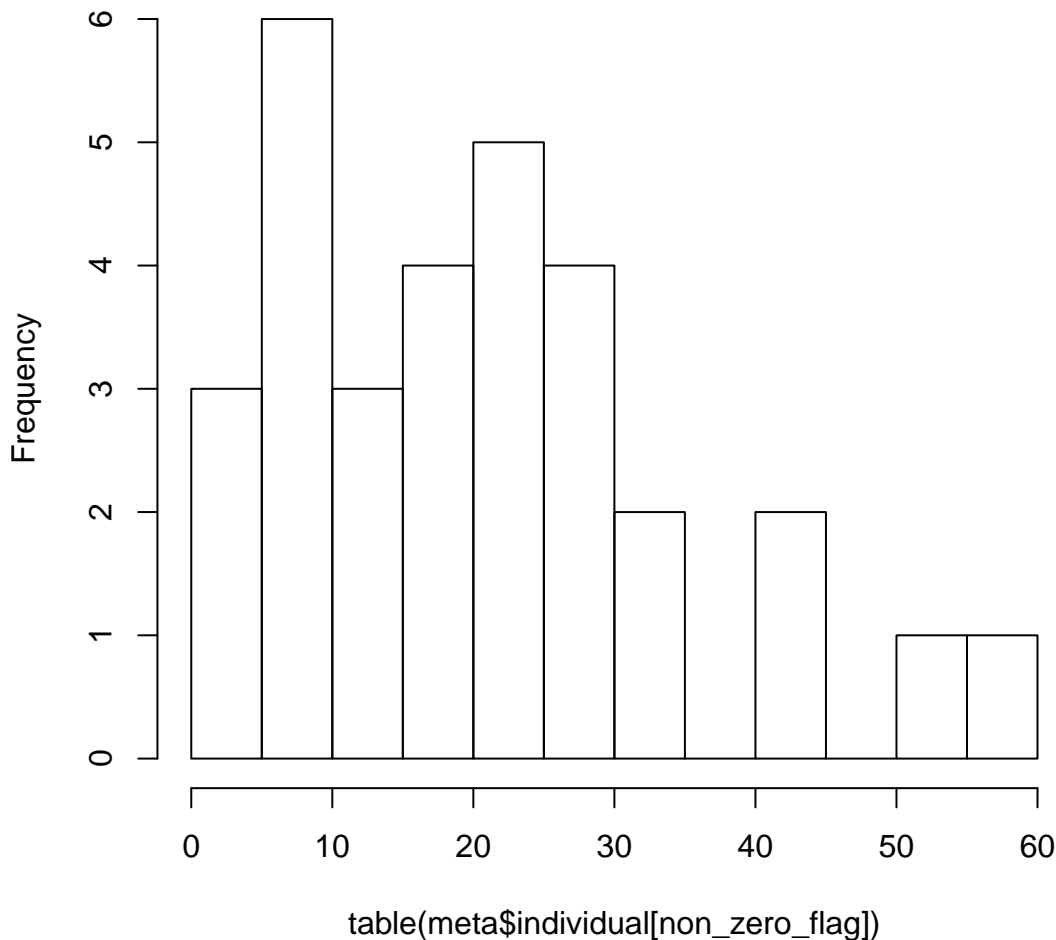
KSless sig: individual expression cell count of gene#42



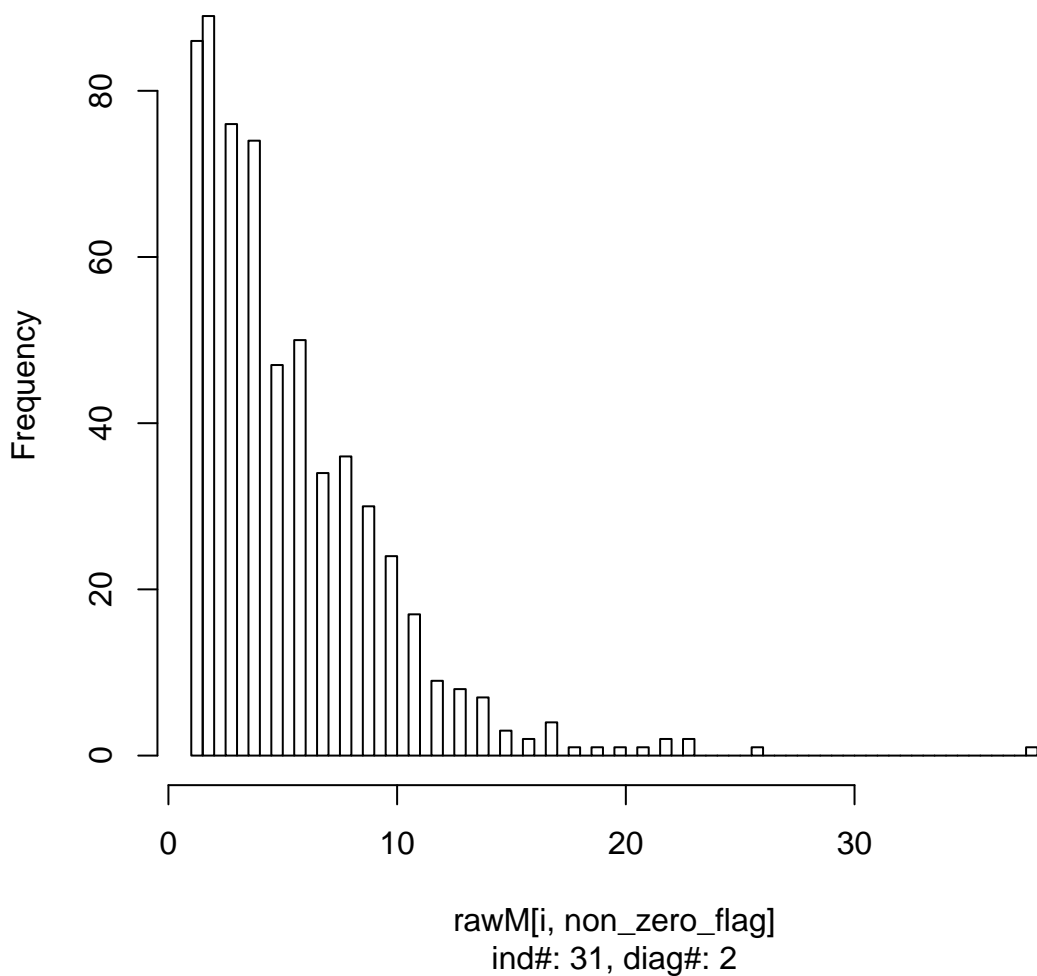
less sig: log expression of gene#57, pval ob=2e-04, non-zero nu



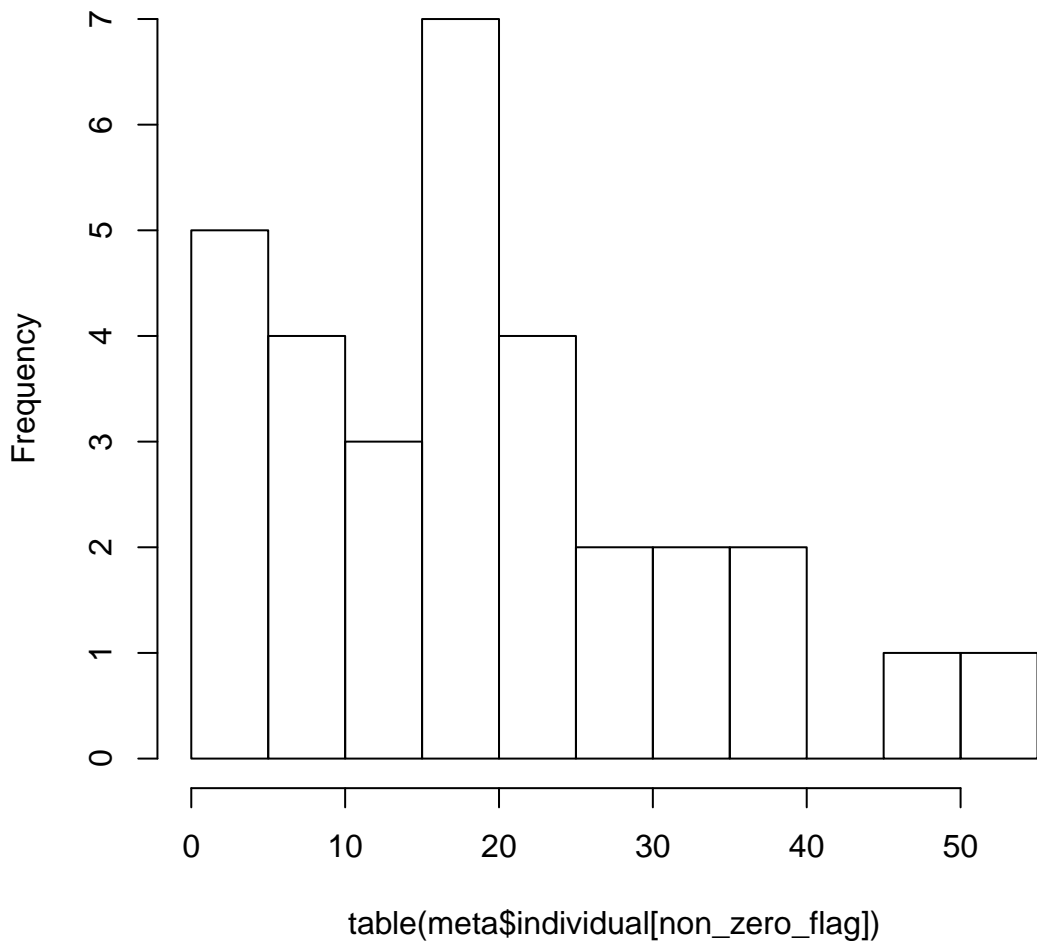
KSless sig: individual expression cell count of gene#57



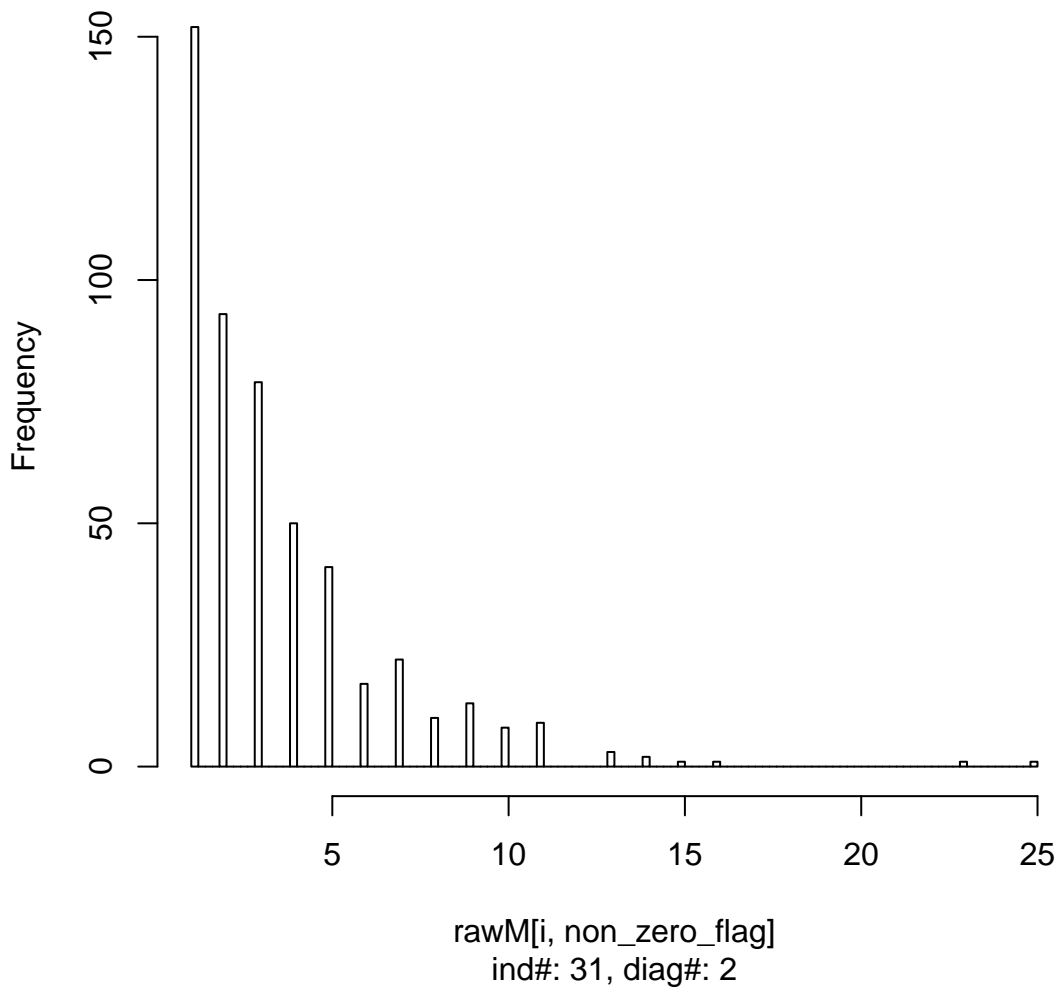
less sig: log expression of gene#63, pval ob=0.121, non-zero nu



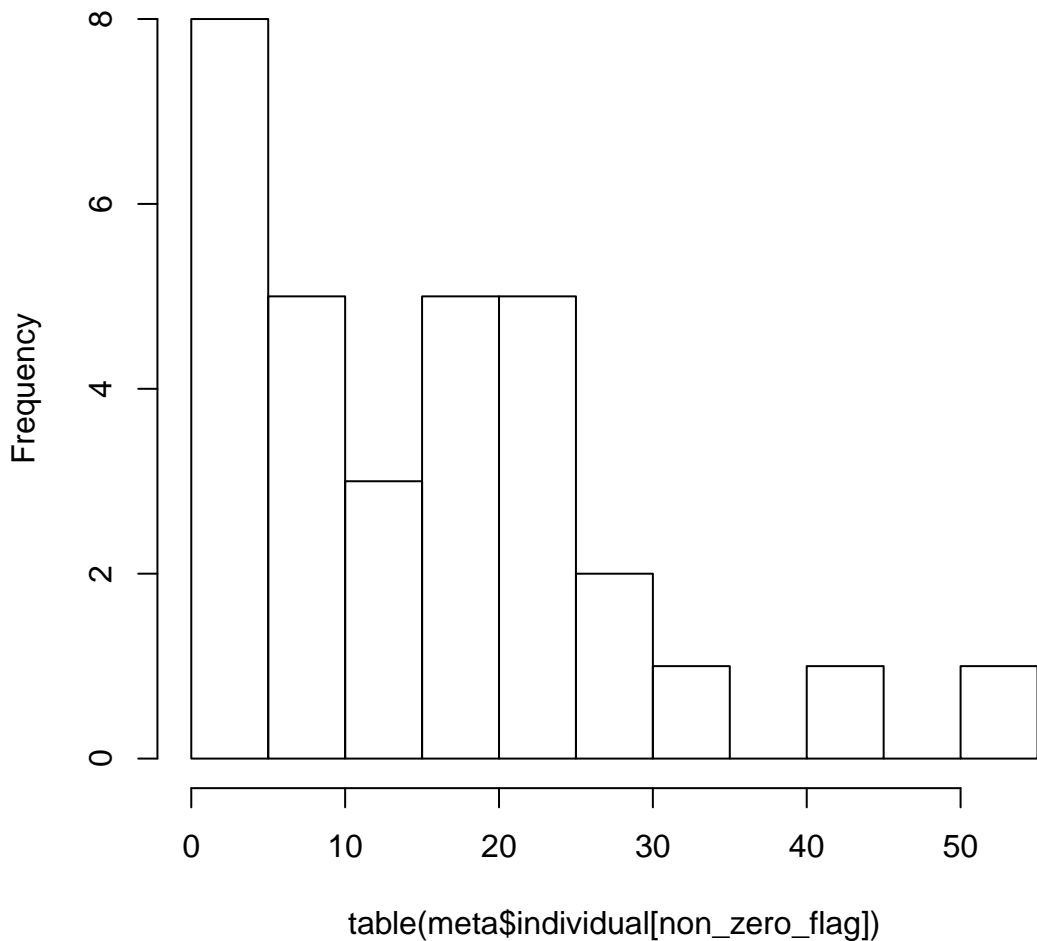
KSless sig: individual expression cell count of gene#63



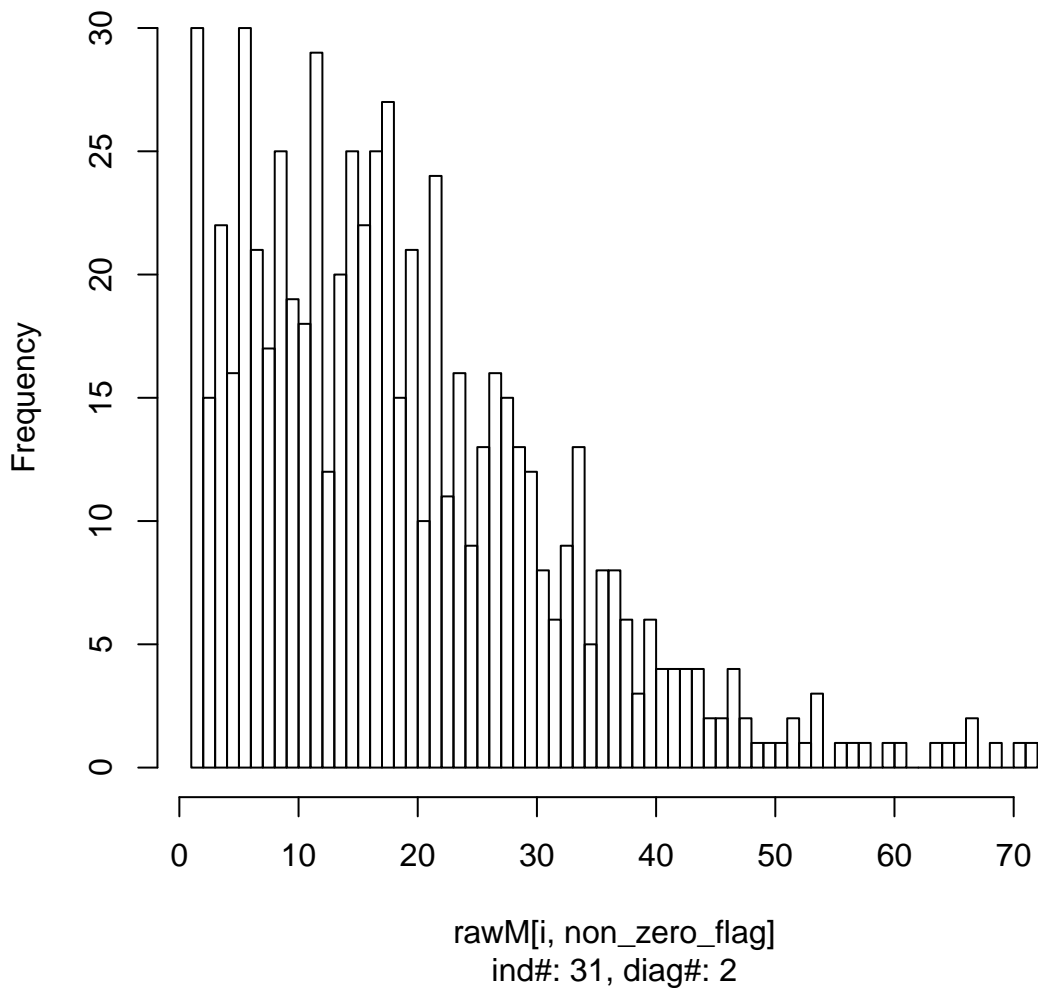
less sig: log expression of gene#90, pval ob=0.1143, non-zero nu



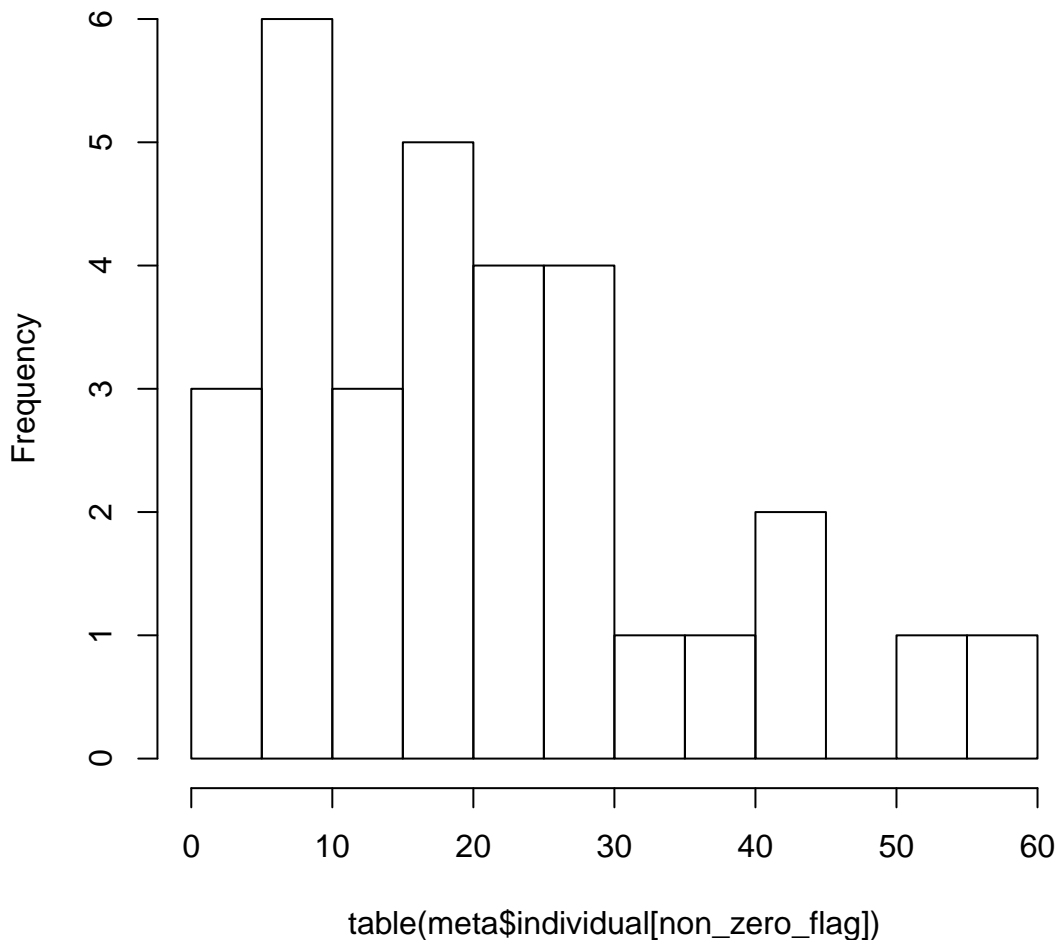
KSless sig: individual expression cell count of gene#90



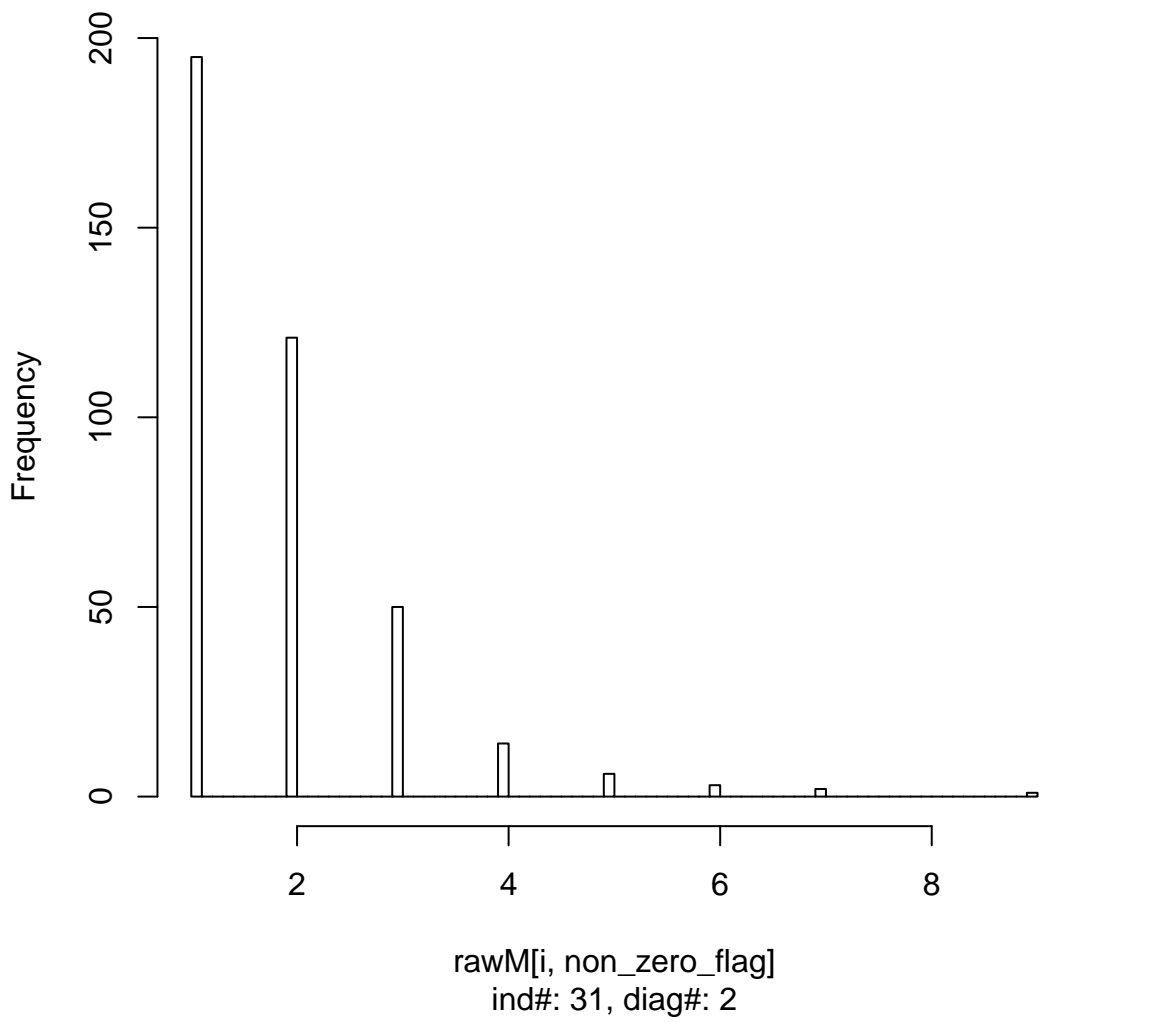
less sig: log expression of gene#117, pval ob=0.3828, non-zero n



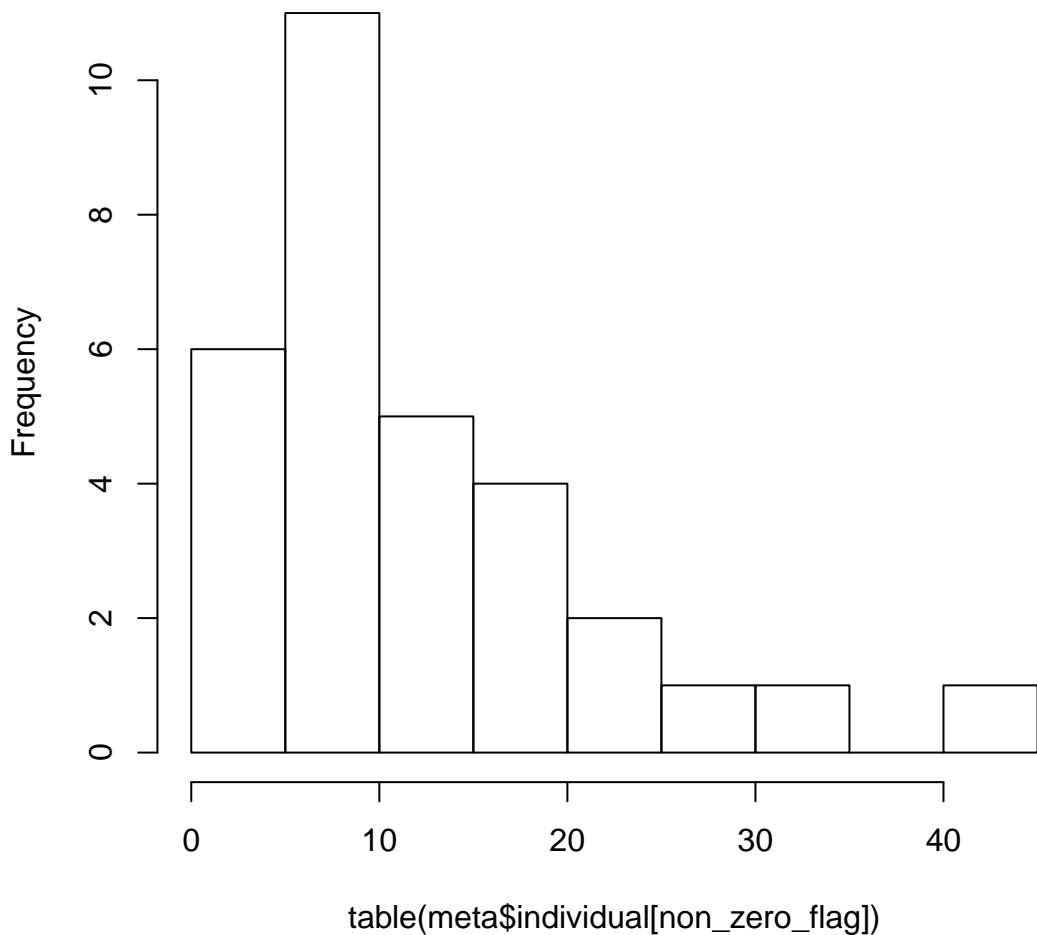
KSless sig: individual expression cell count of gene#117



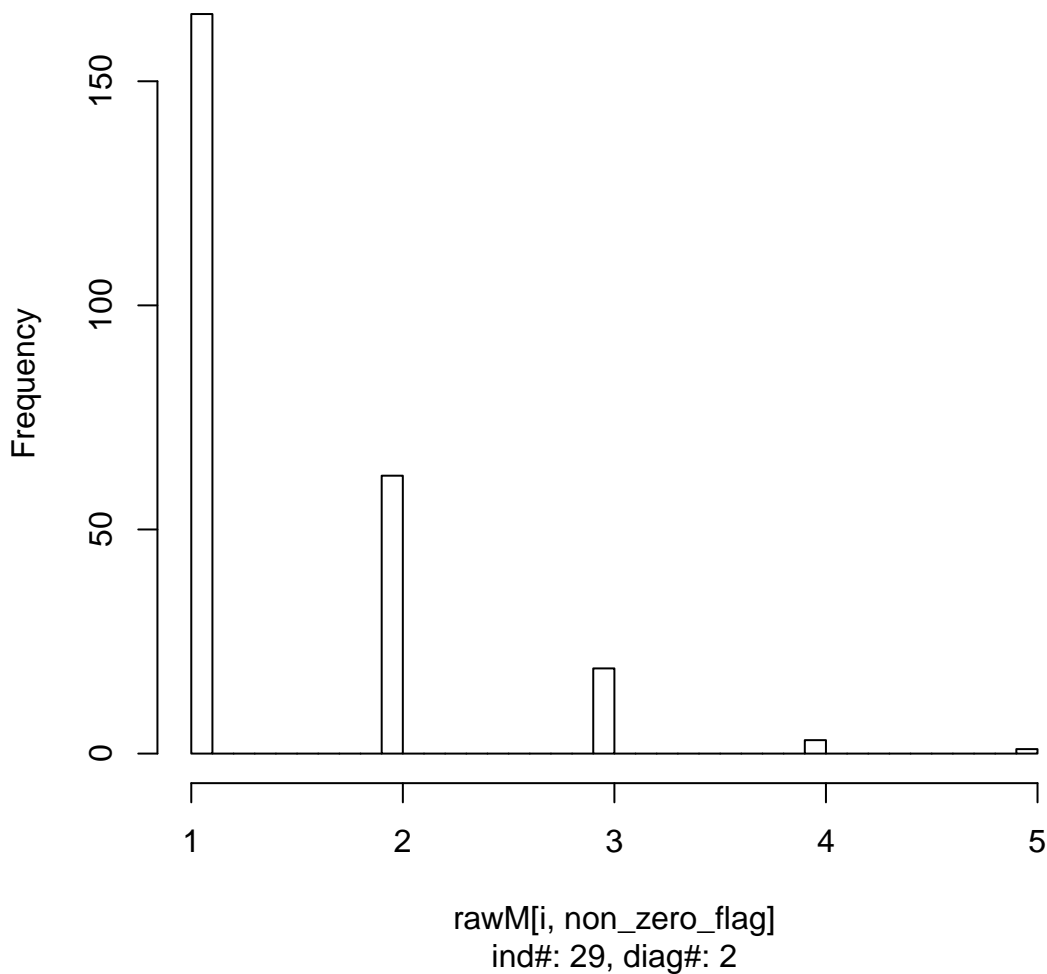
less sig: log expression of gene#126, pval ob=0.2153, non-zero n



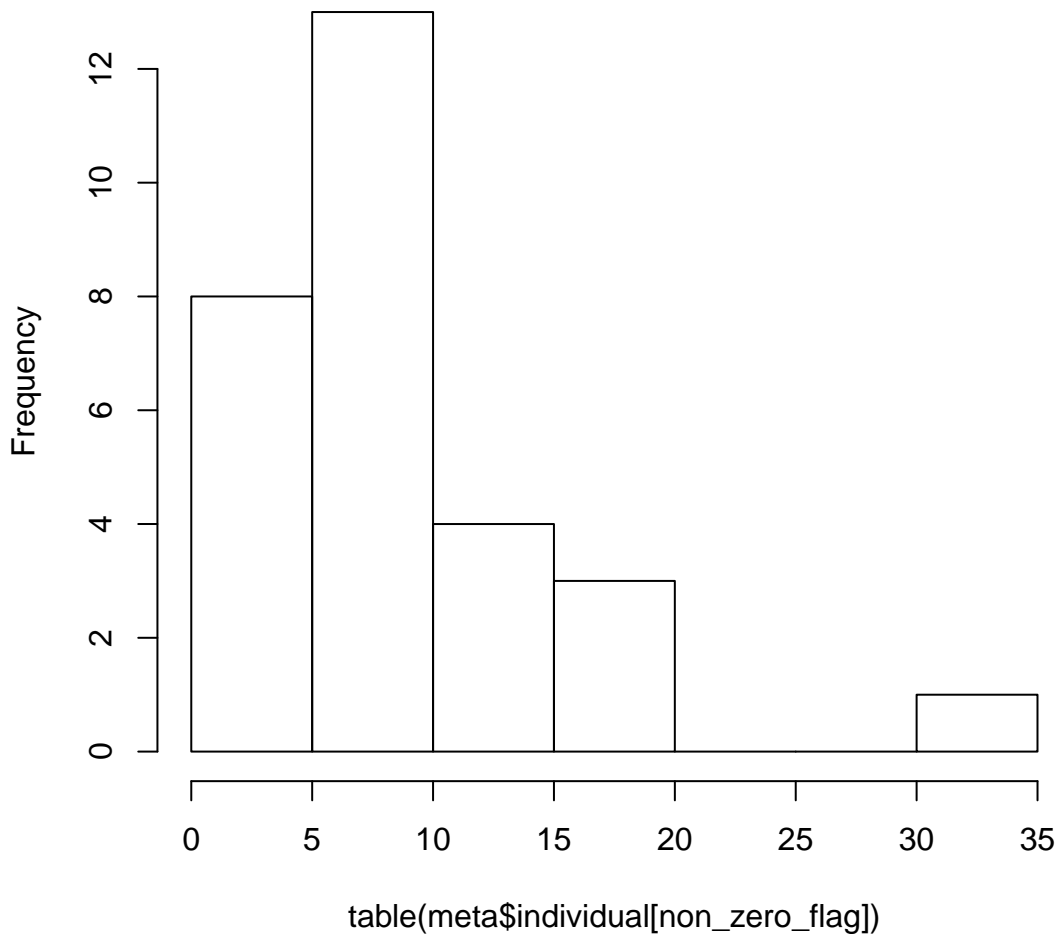
KSless sig: individual expression cell count of gene#126



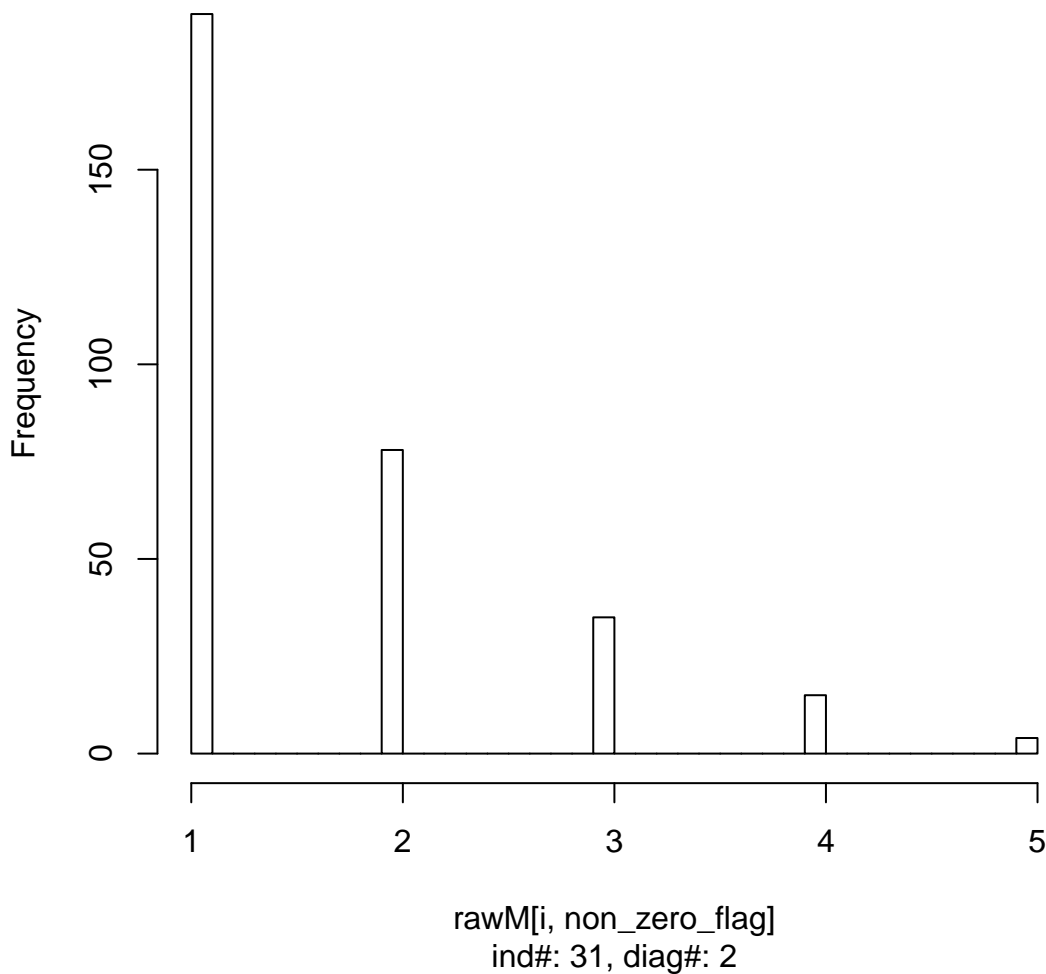
S nonsig: log expression of gene#4, pval ob=0.6348, non-zero nu



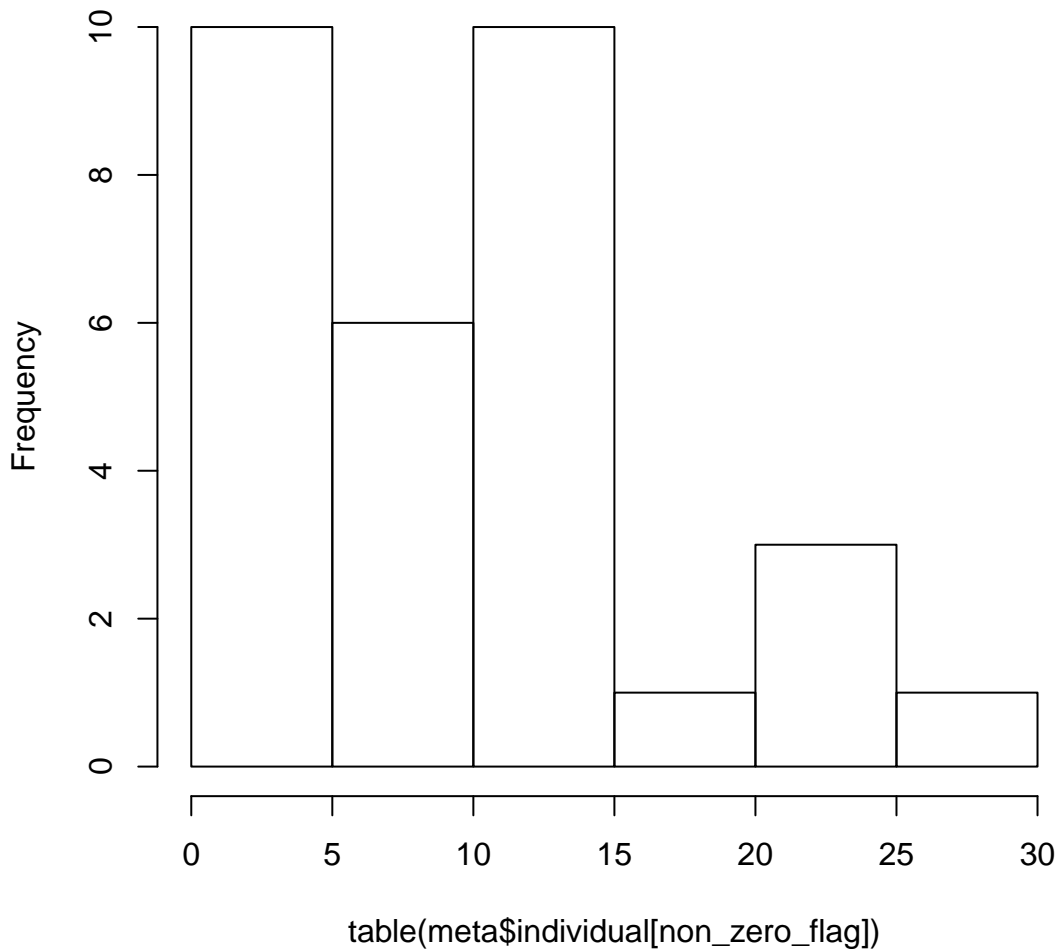
KSless nonsig: individual expression cell count of gene#4



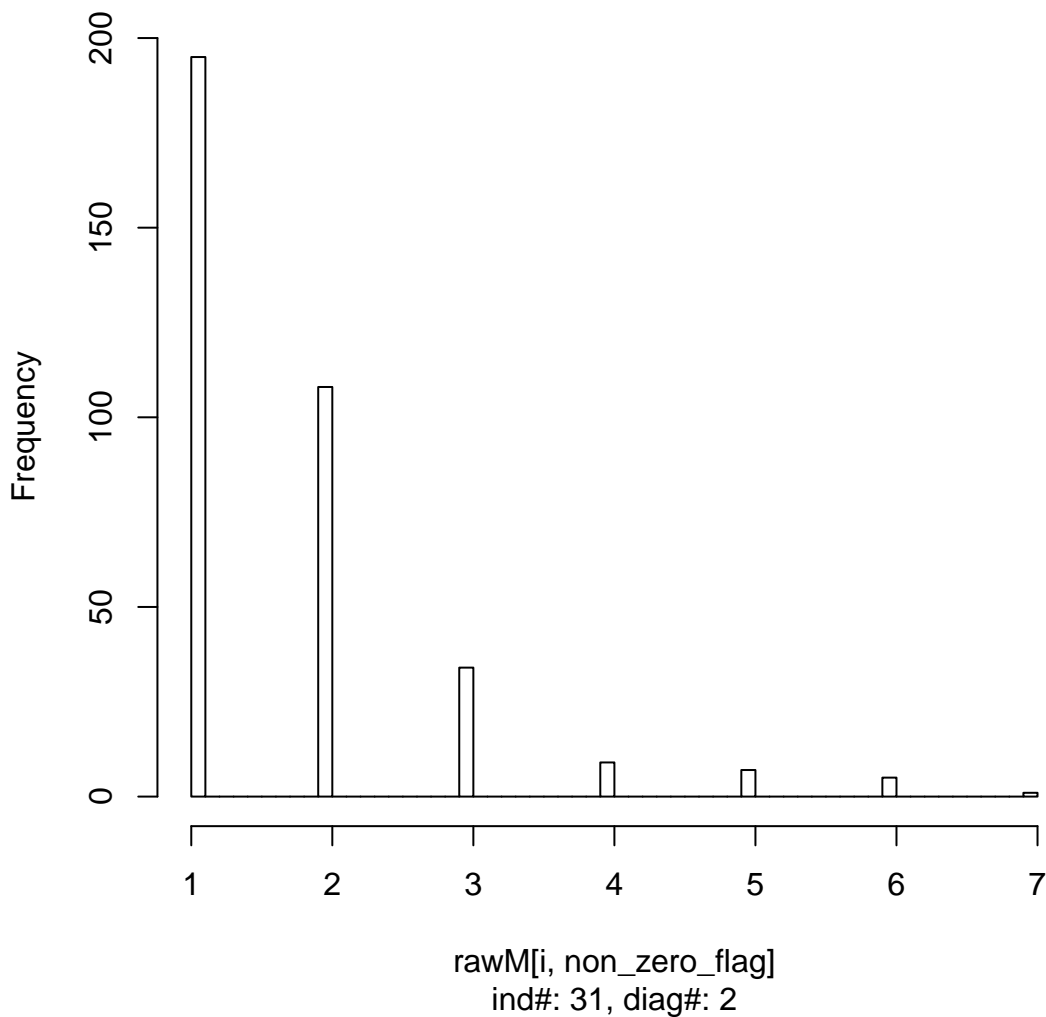
S nonsig: log expression of gene#6, pval ob=0.2506, non-zero num



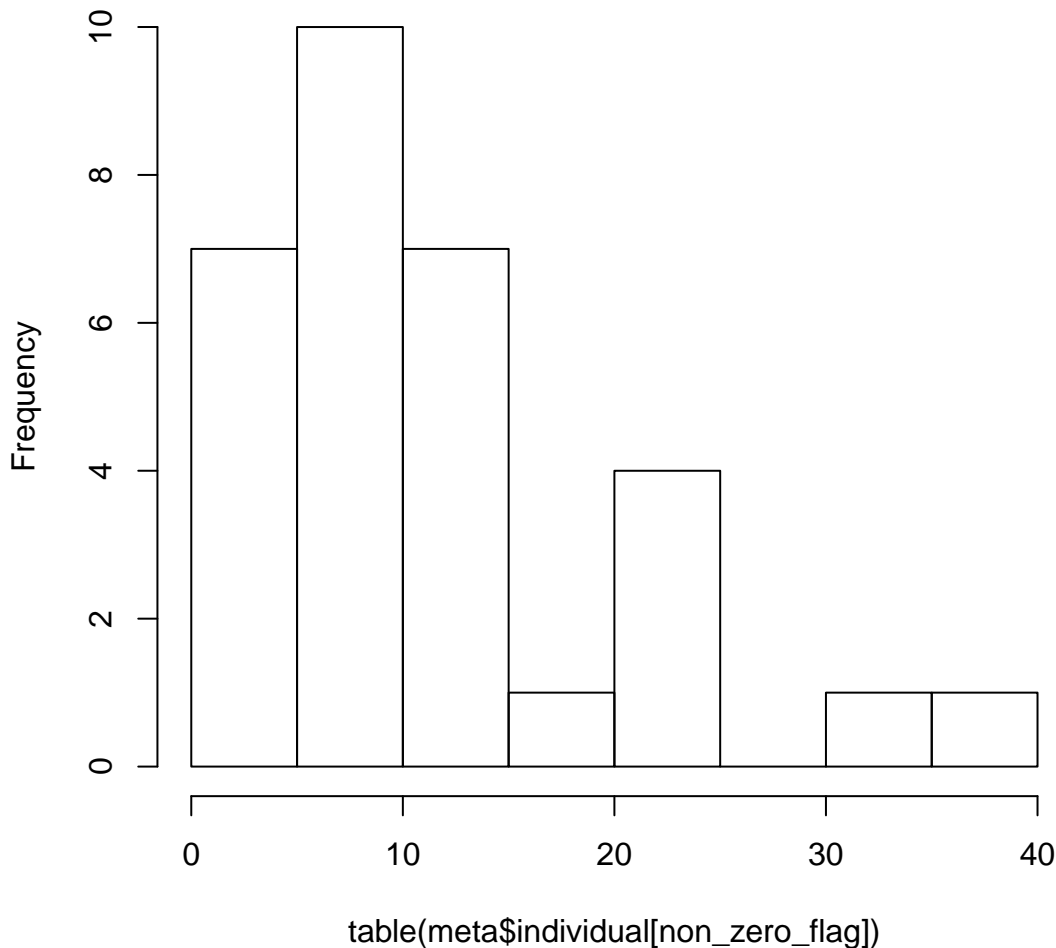
KSless nonsig: individual expression cell count of gene#6



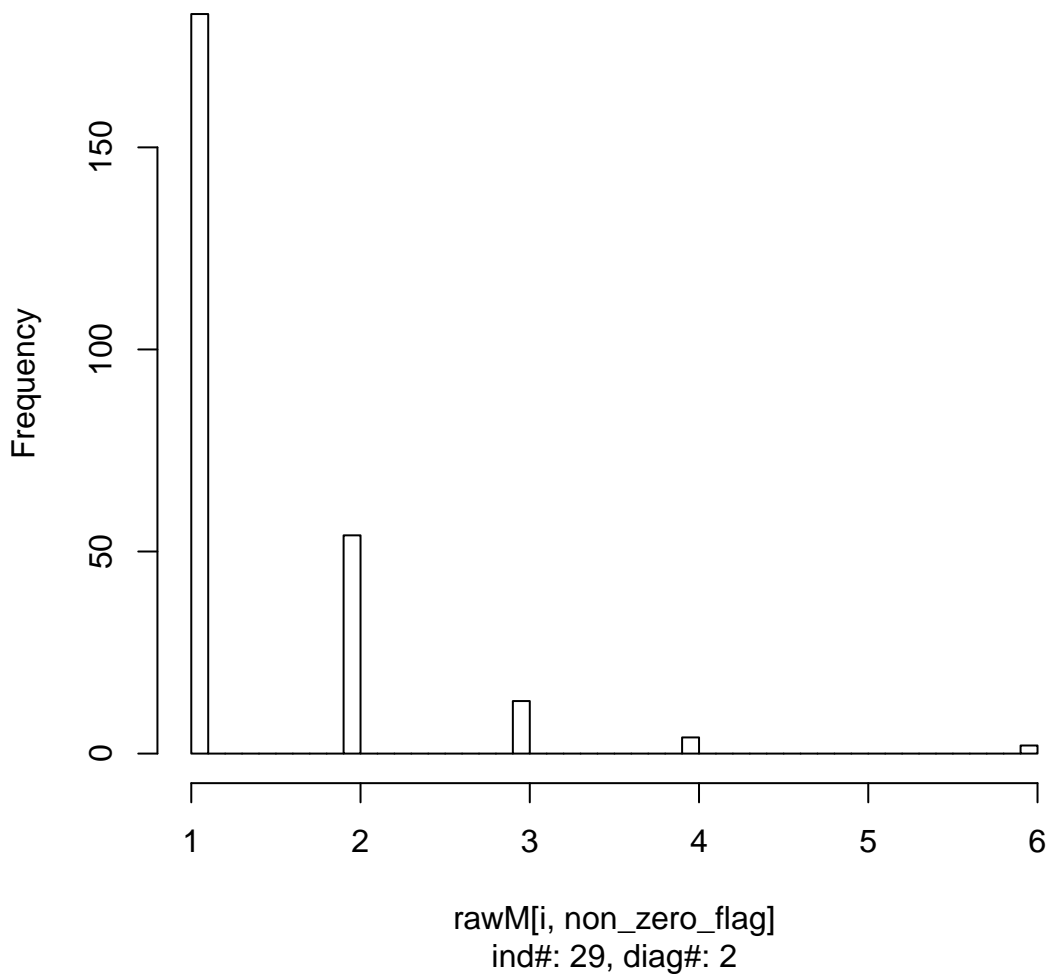
S nonsig: log expression of gene#8, pval ob=0.1947, non-zero num



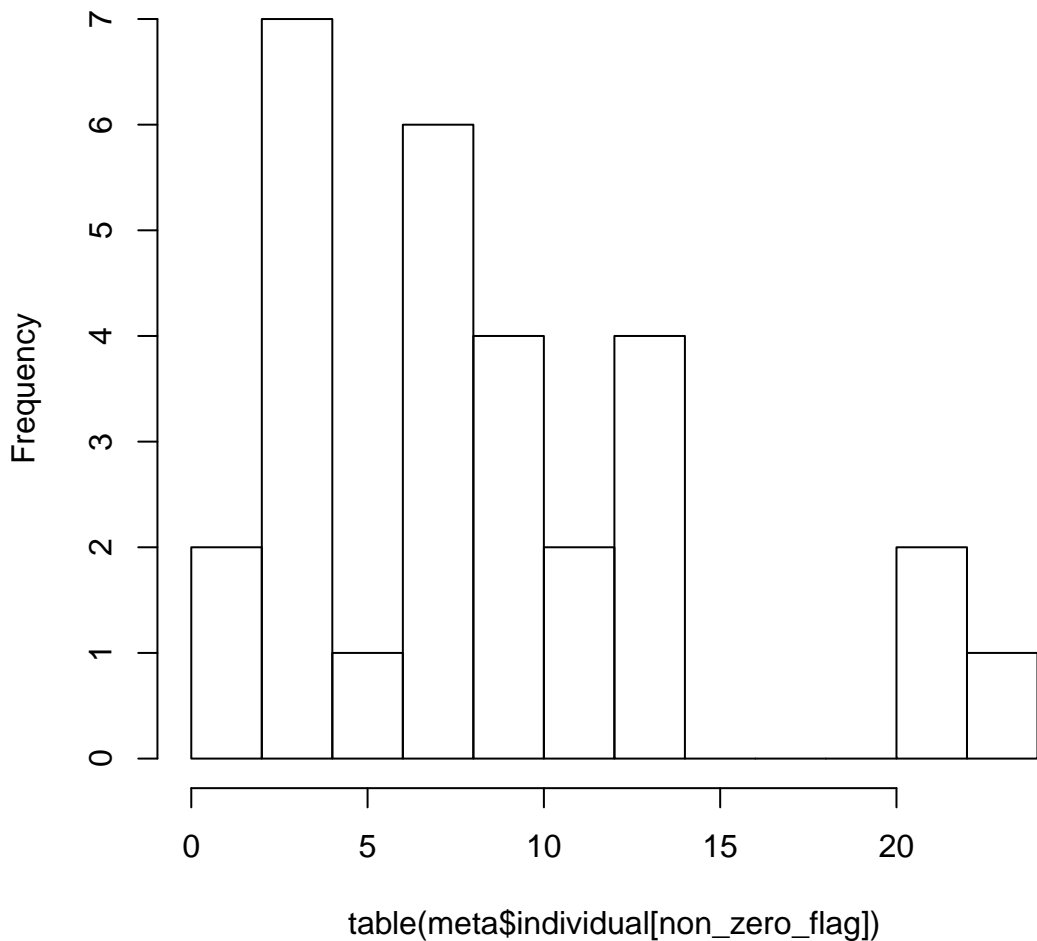
KSless nonsig: individual expression cell count of gene#8



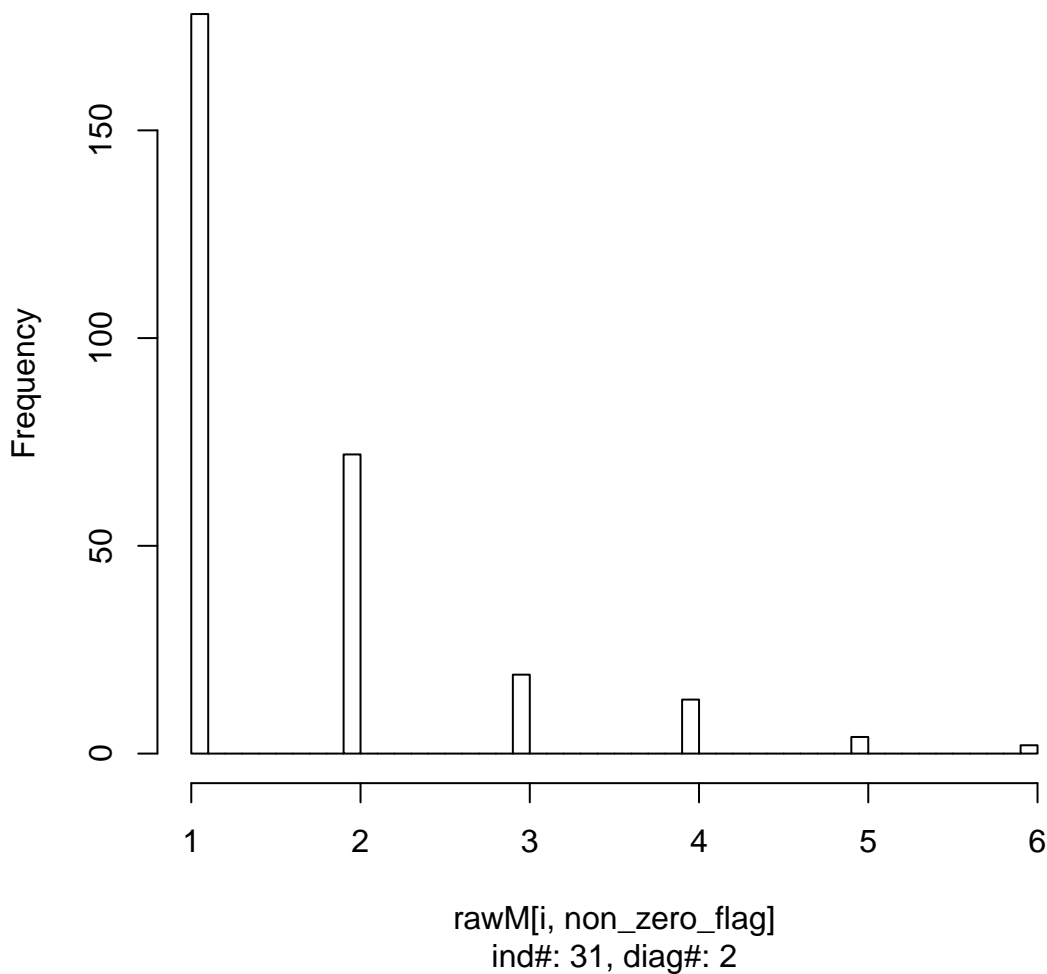
S nonsig: log expression of gene#9, pval ob=0.8056, non-zero nu



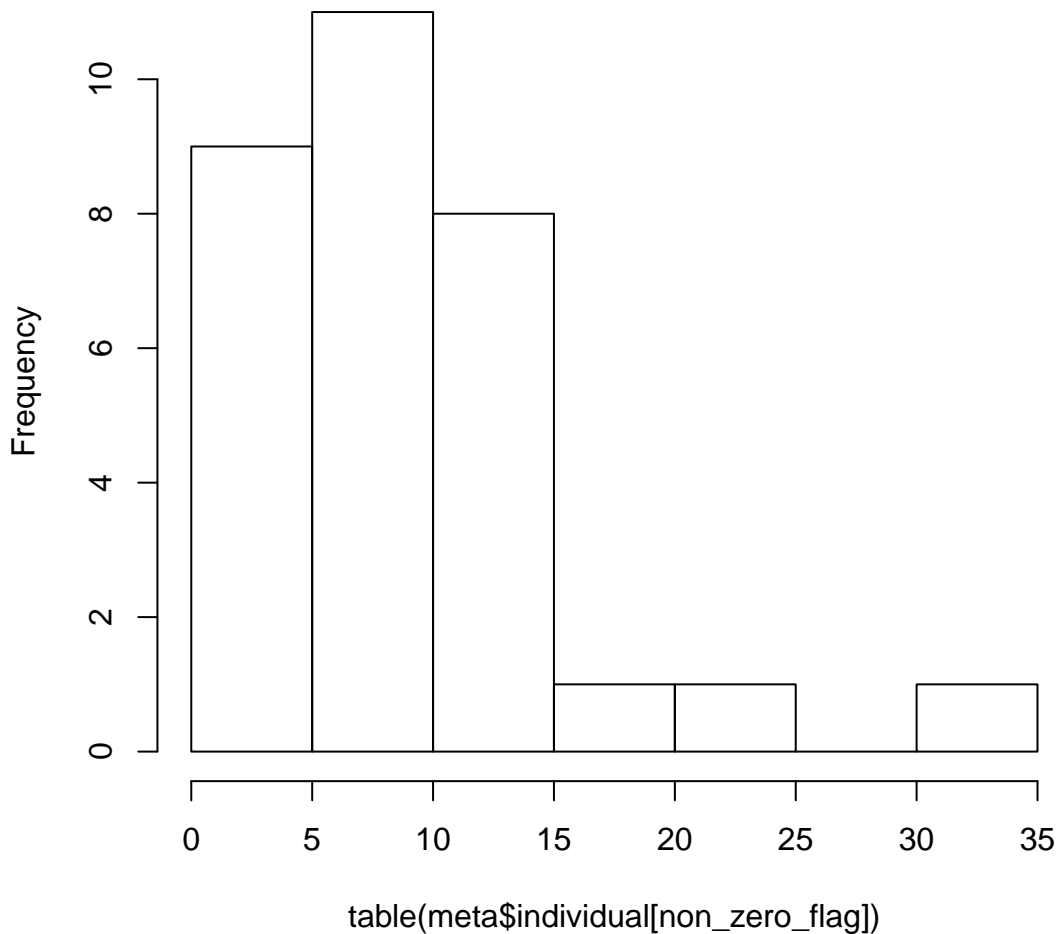
KSless nonsig: individual expression cell count of gene#9



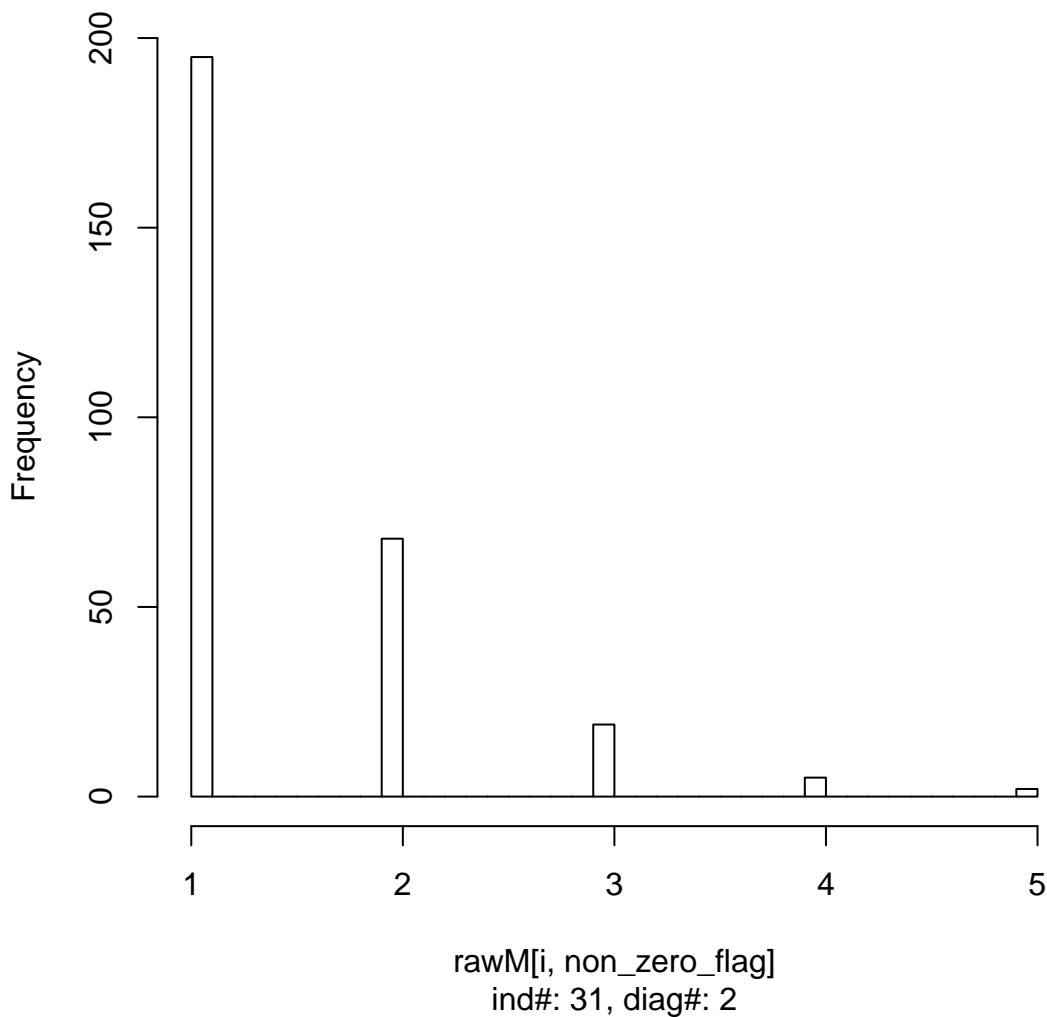
nonsig: log expression of gene#11, pval ob=0.7616, non-zero nu



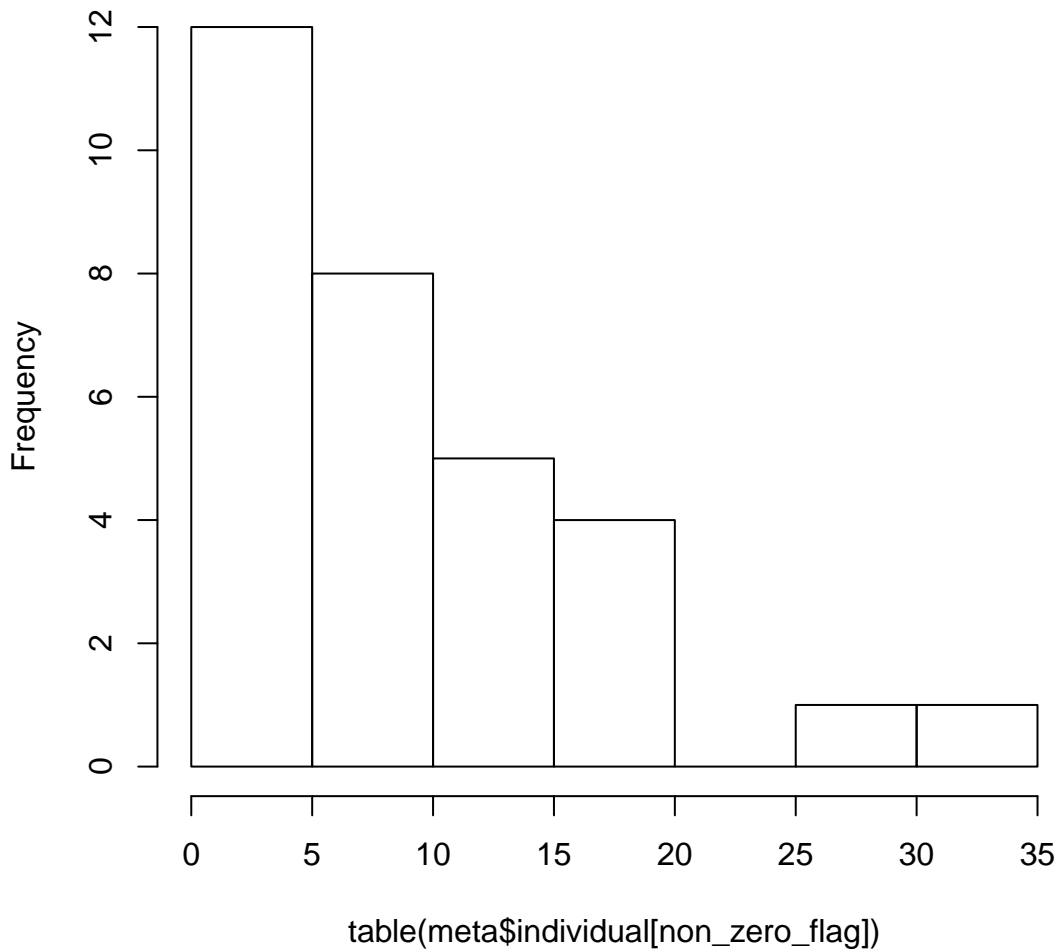
KSless nonsig: individual expression cell count of gene#11



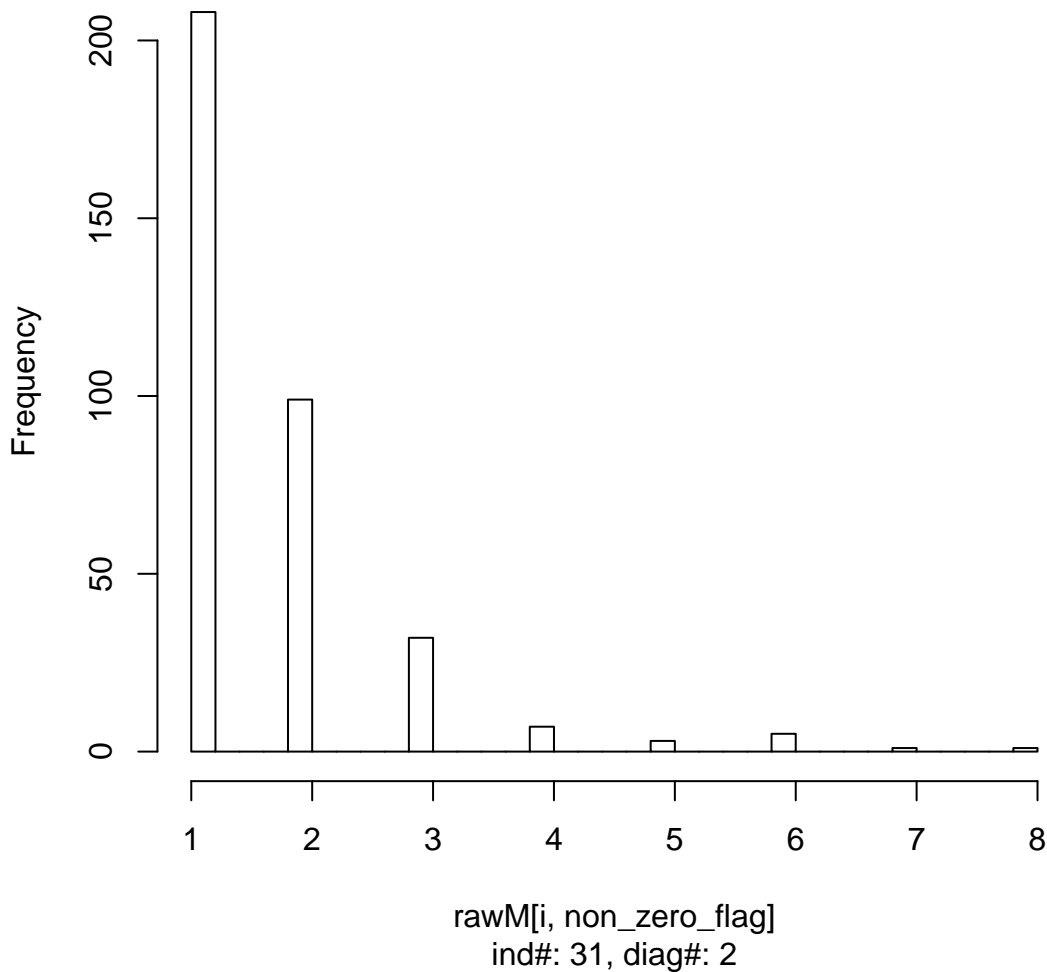
ns nonsig: log expression of gene#12, pval ob=0.8168, non-zero nu



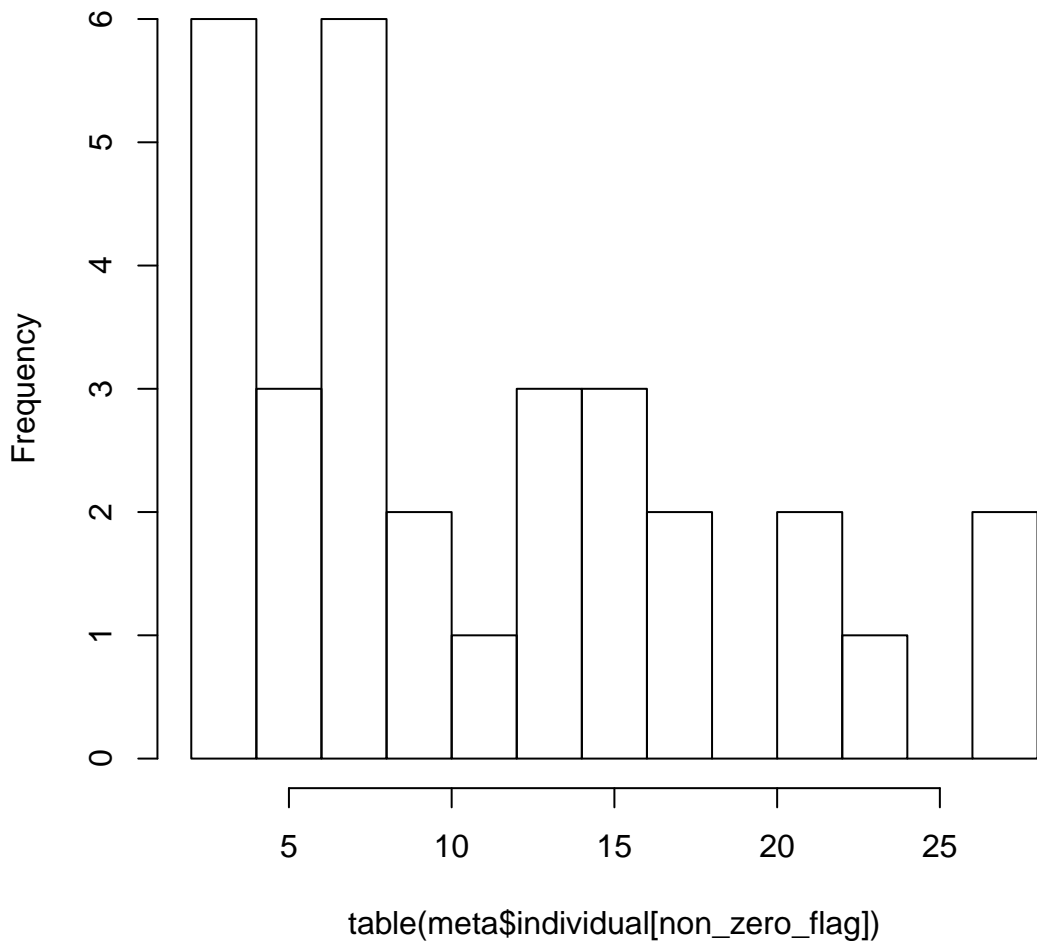
KSless nonsig: individual expression cell count of gene#12



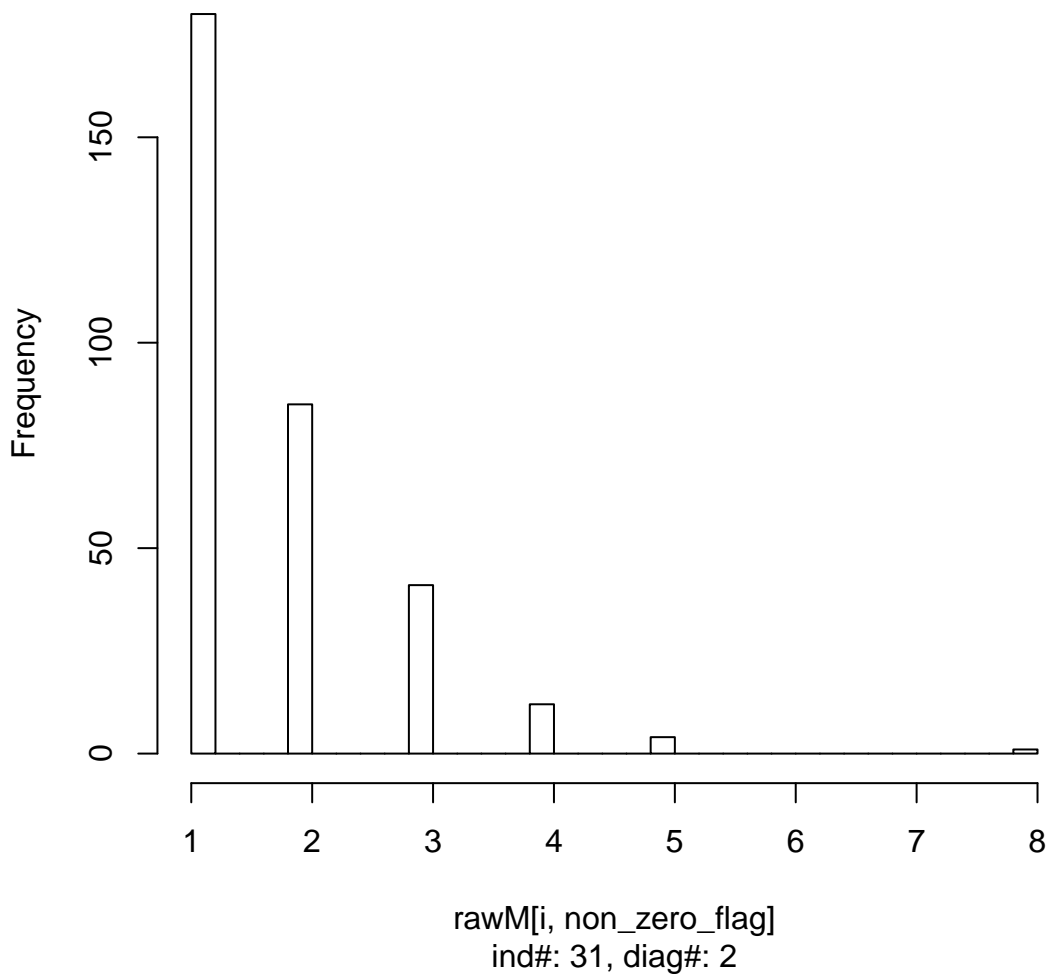
nsig: log expression of gene#15, pval ob=0.0968, non-zero nu



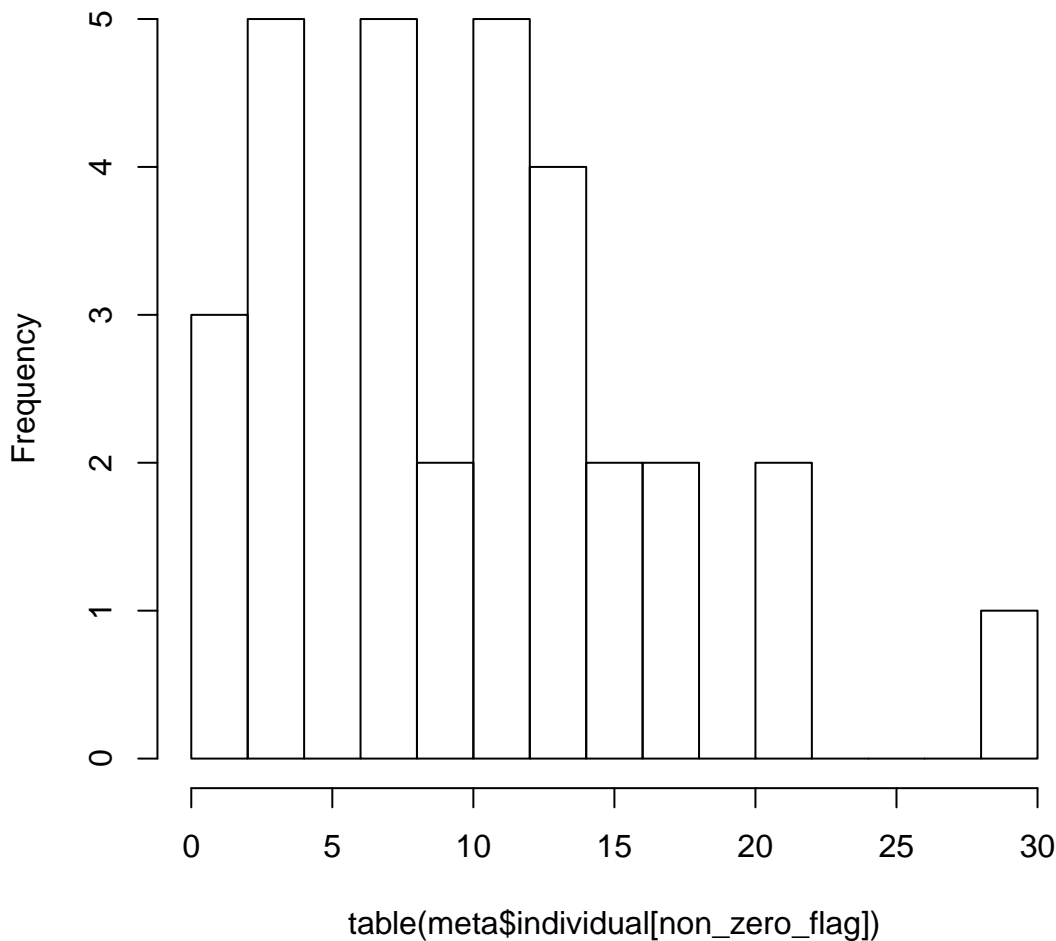
KSless nonsig: individual expression cell count of gene#15



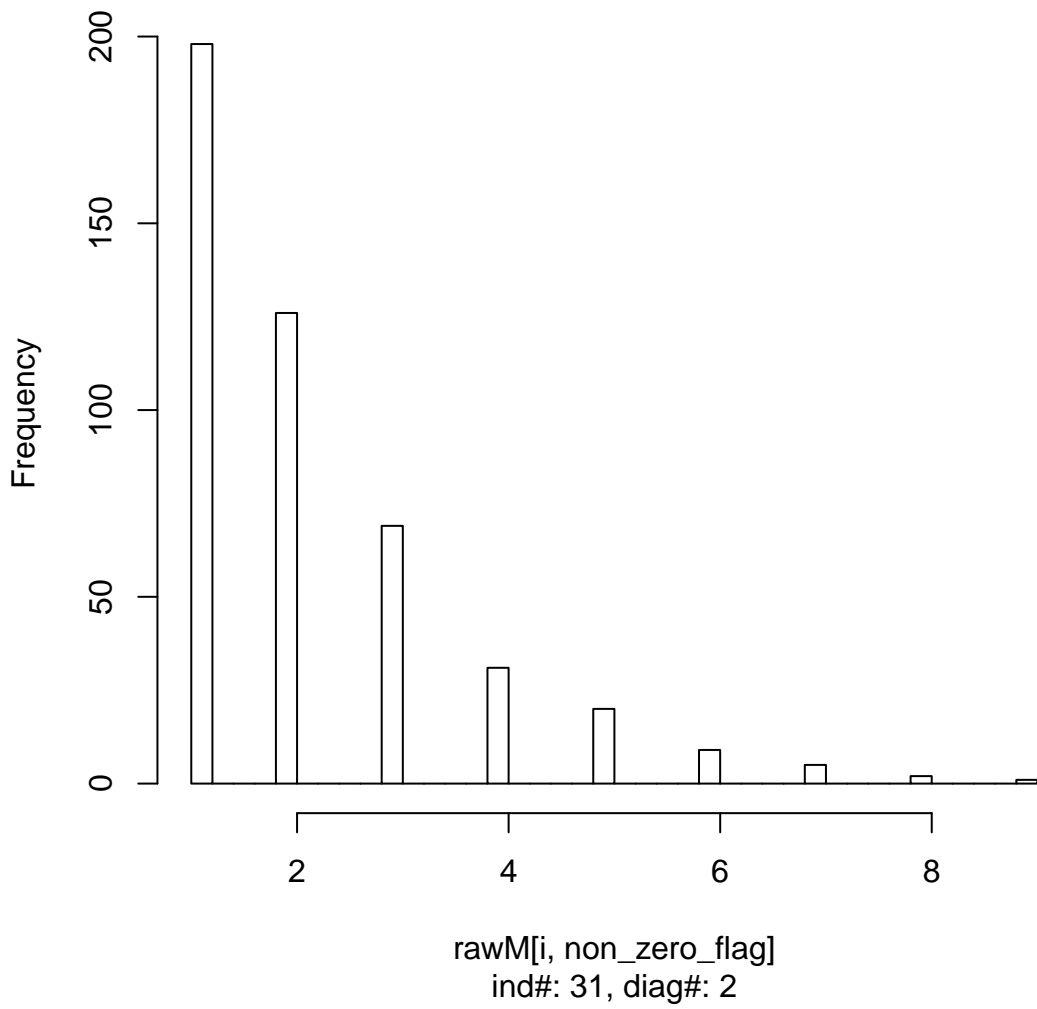
nsig: log expression of gene#16, pval ob=0.9131, non-zero nu



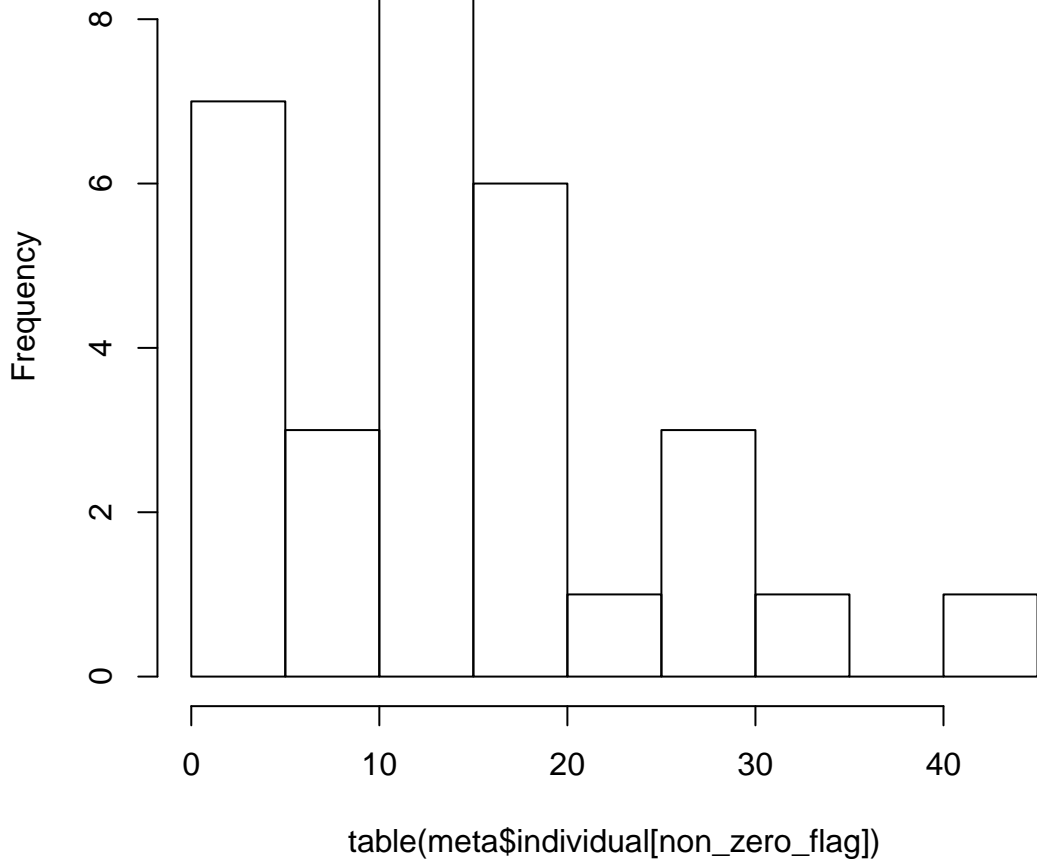
KSless nonsig: individual expression cell count of gene#16



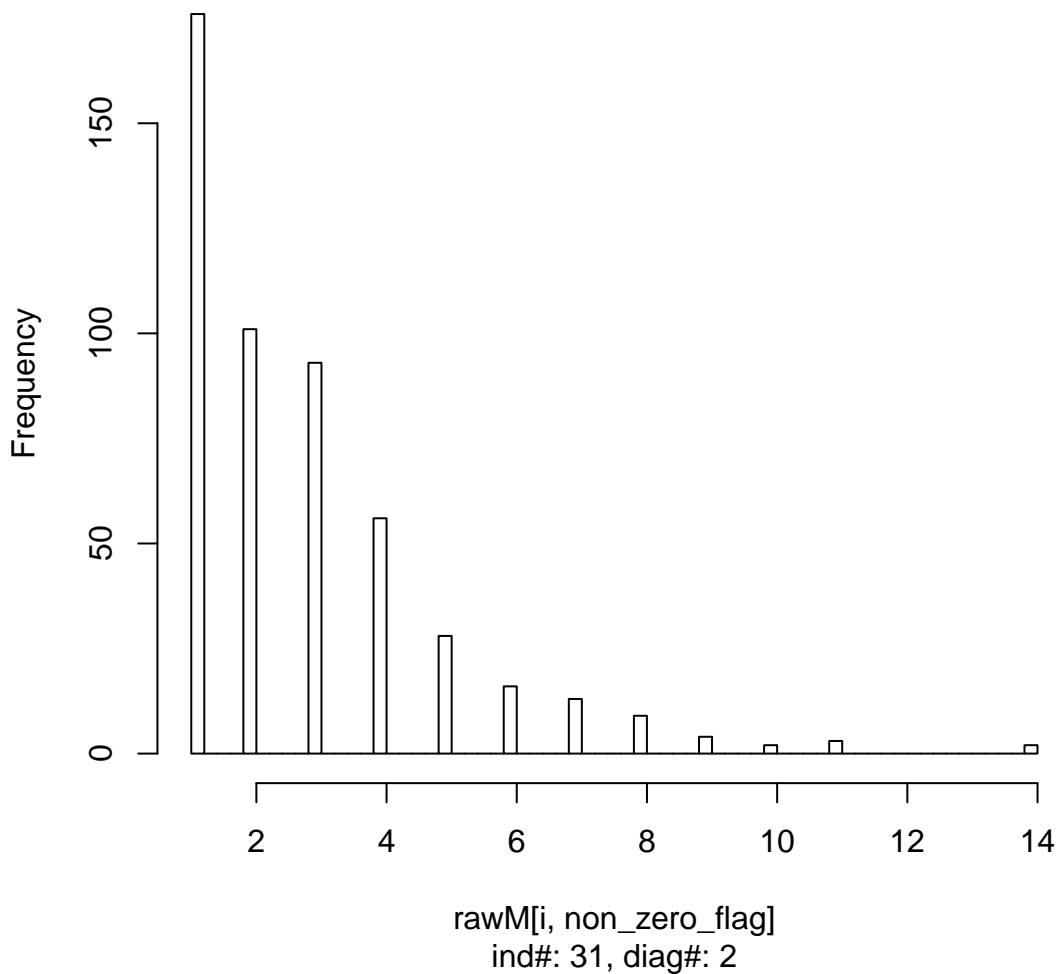
nsig: log expression of gene#18, pval ob=0.9225, non-zero nu



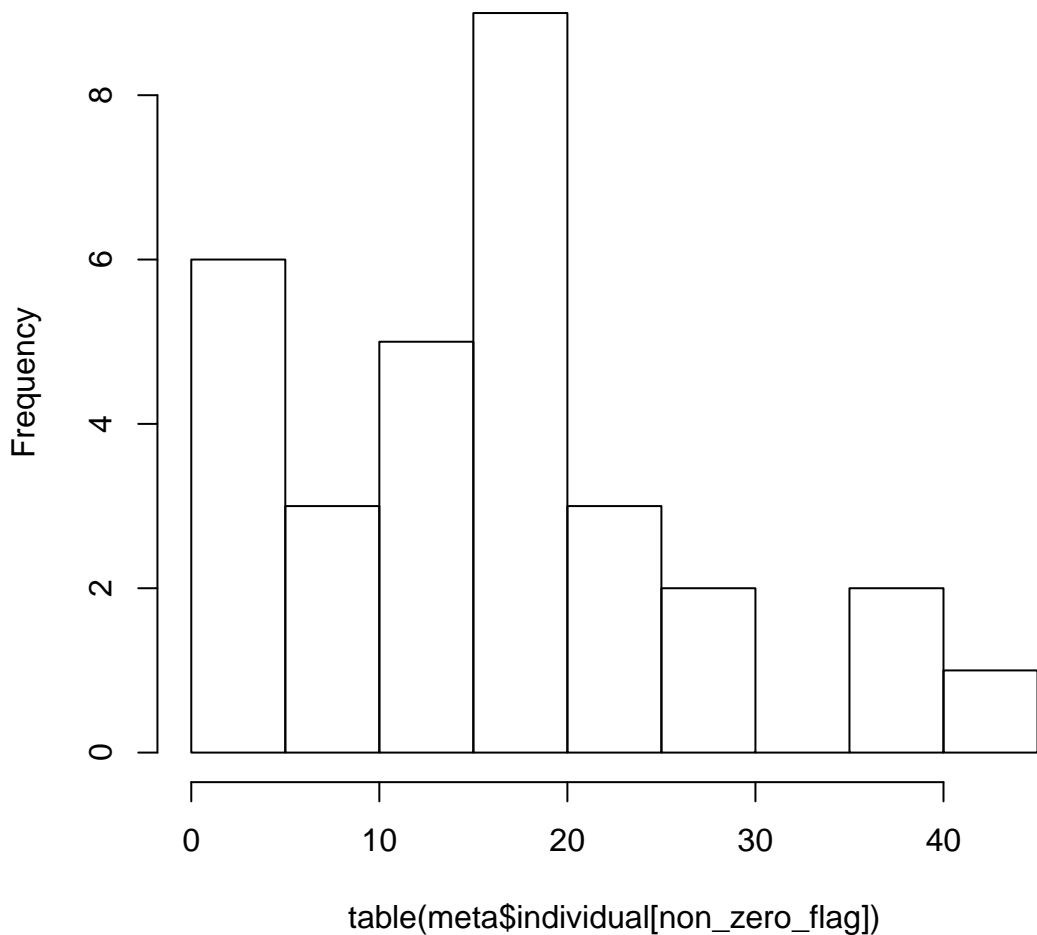
KSless nonsig: individual expression cell count of gene#18



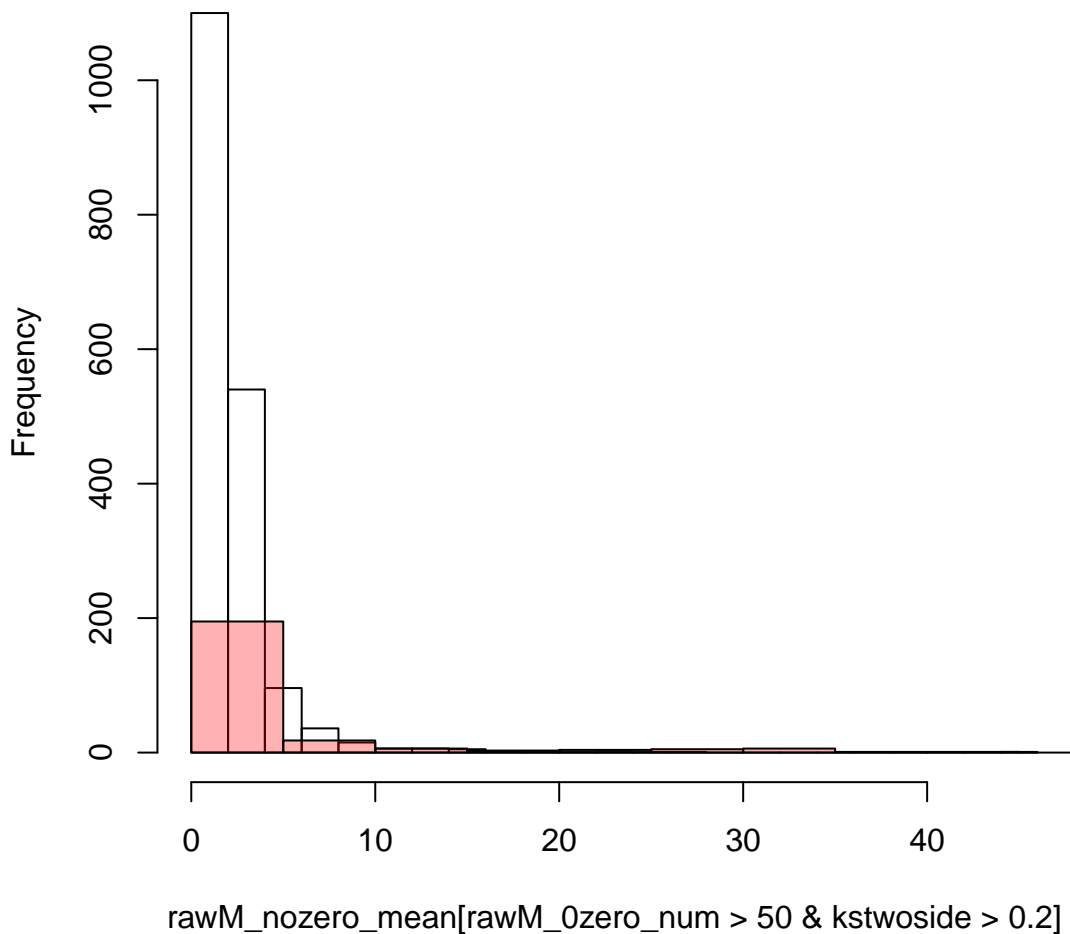
nsig: log expression of gene#19, pval ob=0.6451, non-zero nu



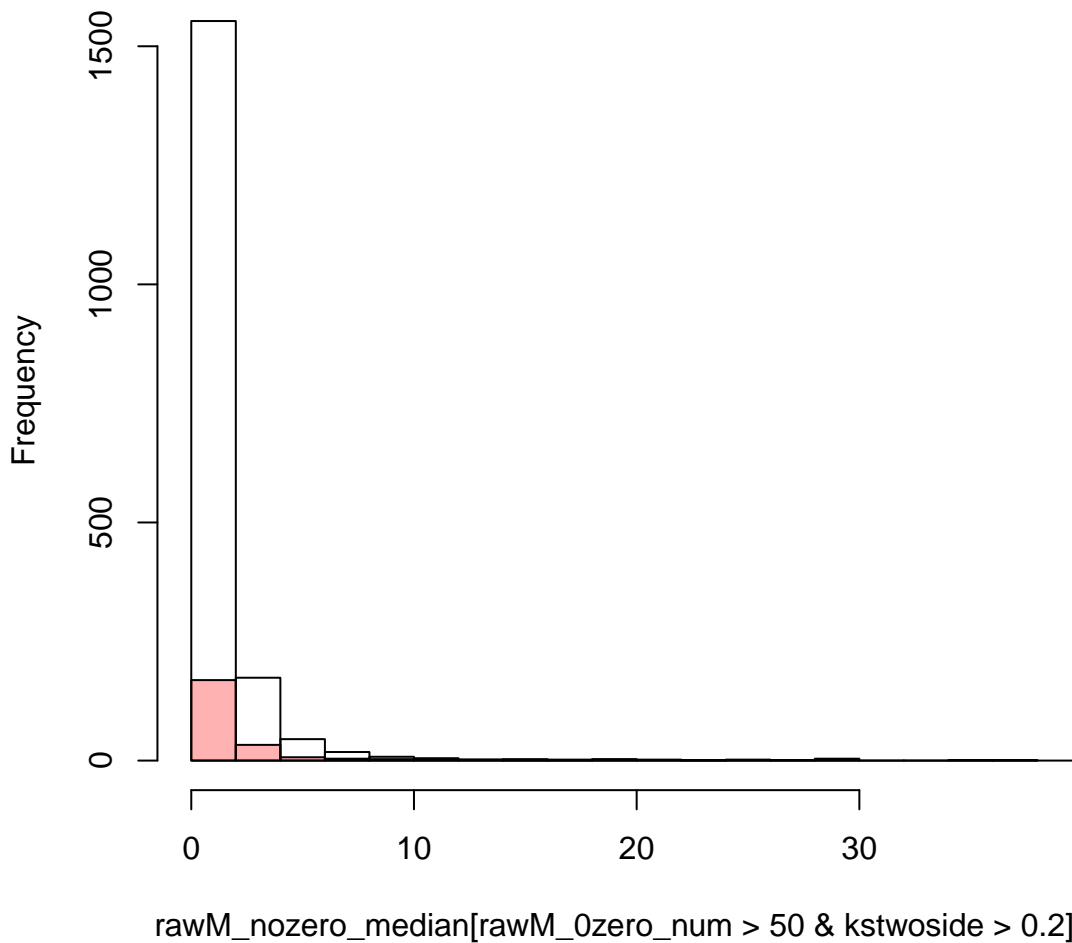
KSless nonsig: individual expression cell count of gene#19



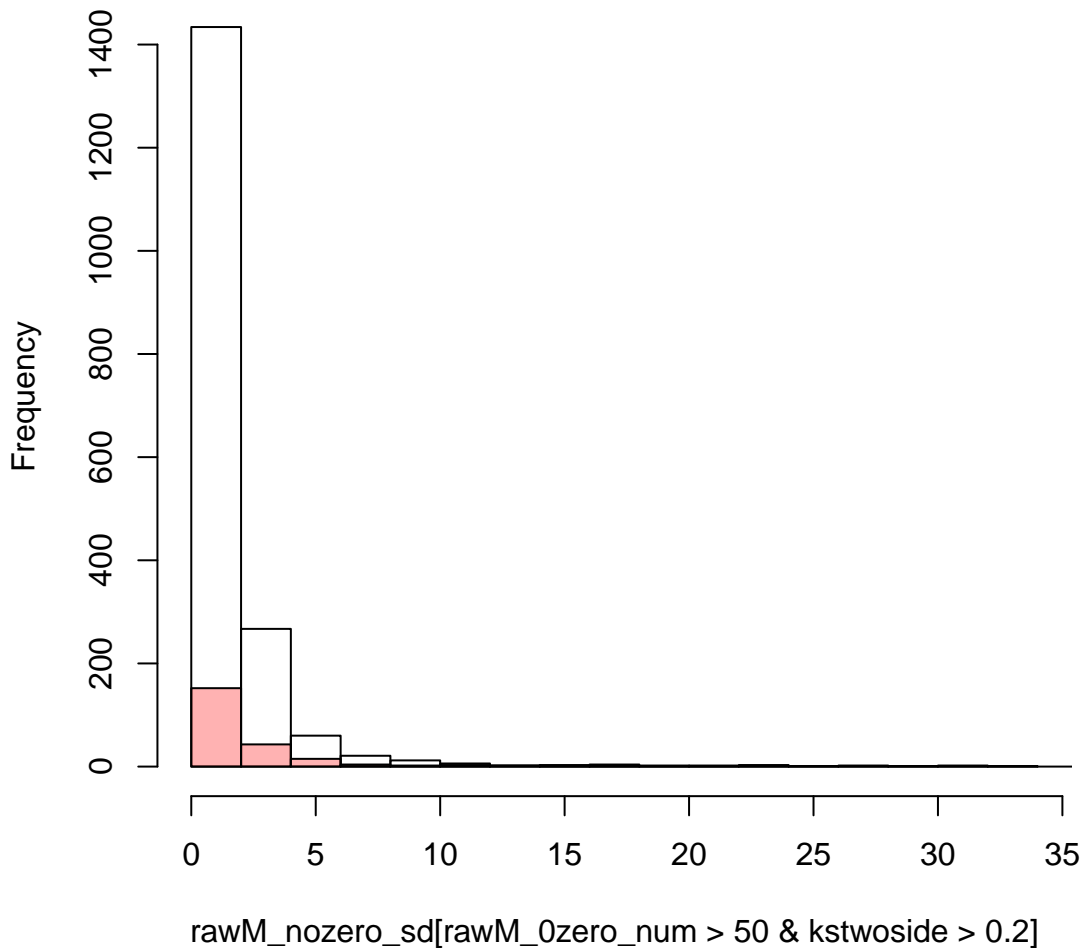
Histogram of rawM_nozero_mean[rawM_0zero_num > 50 & kstwsid



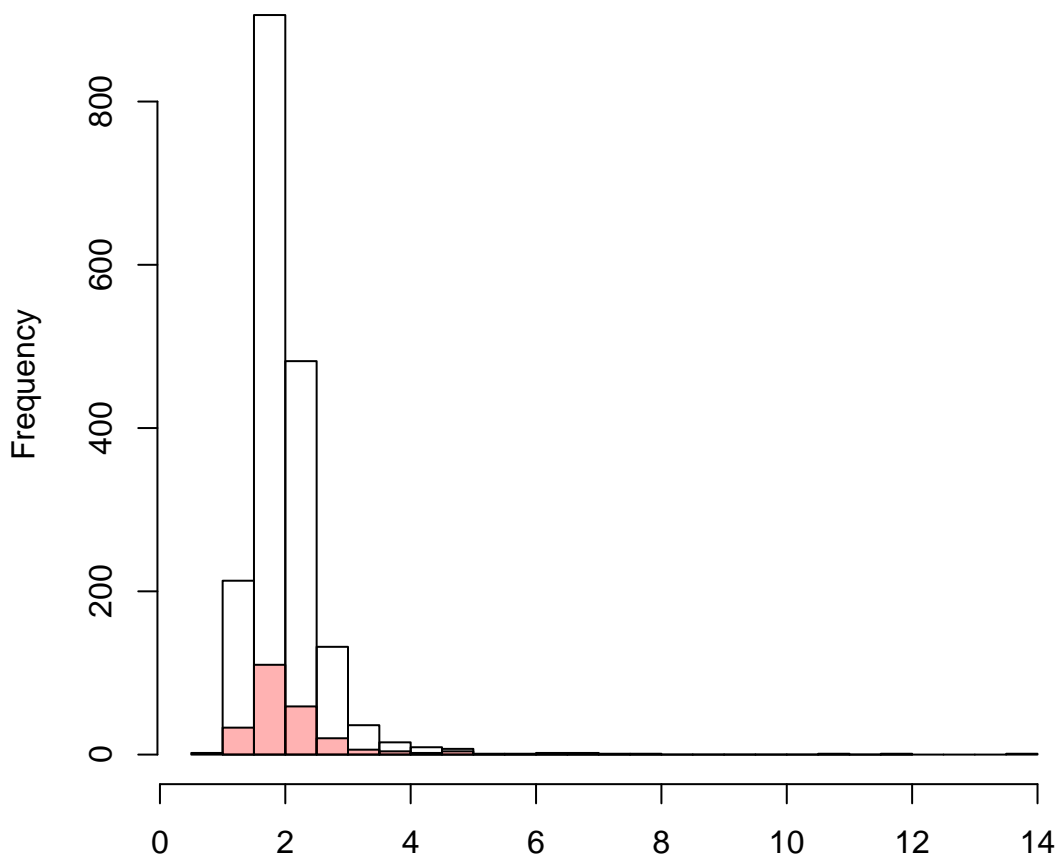
ogram of rawM_nozero_median[rawM_0zero_num > 50 & kstwosi



histogram of rawM_nozero_sd[rawM_0zero_num > 50 & kstwoside

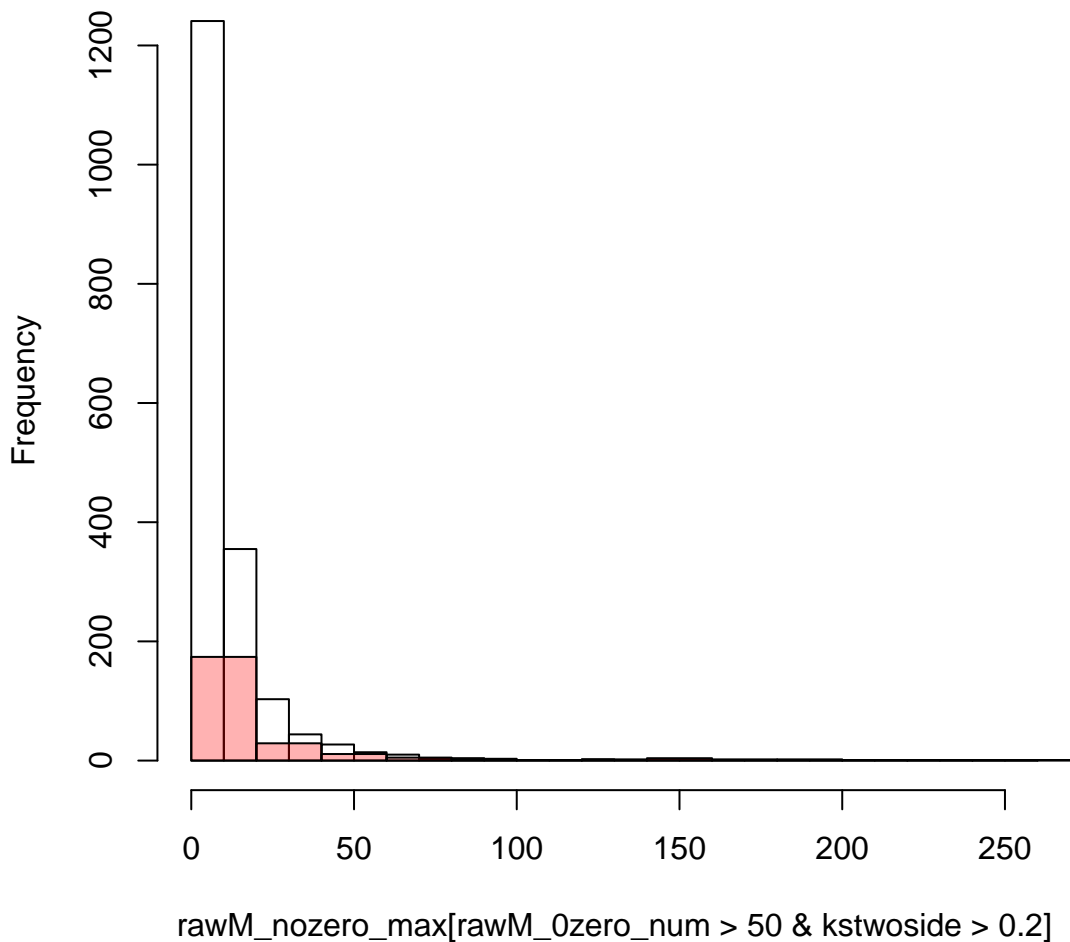


gram of rawM_nozero_skewness[rawM_0zero_num > 50 & kstws

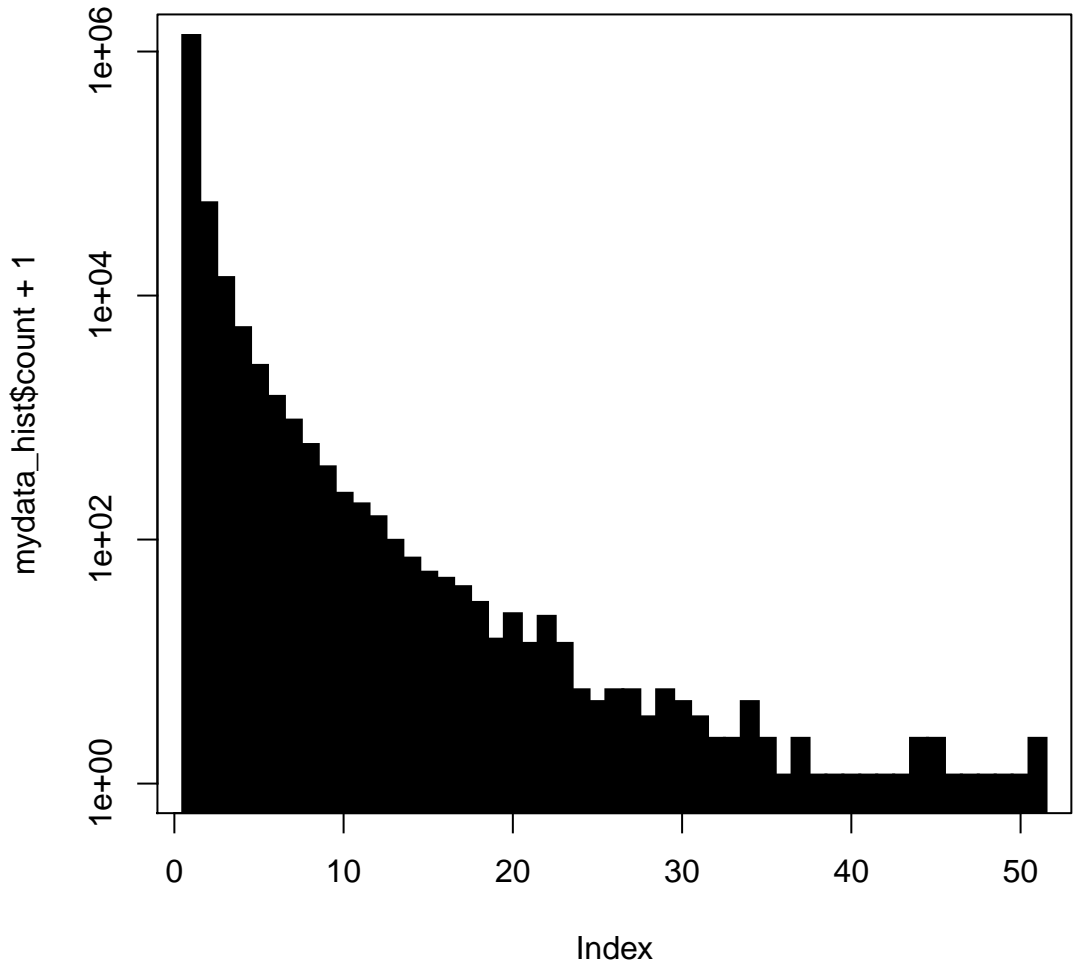


rawM_nozero_skewness[rawM_0zero_num > 50 & kstwside > 0.2]

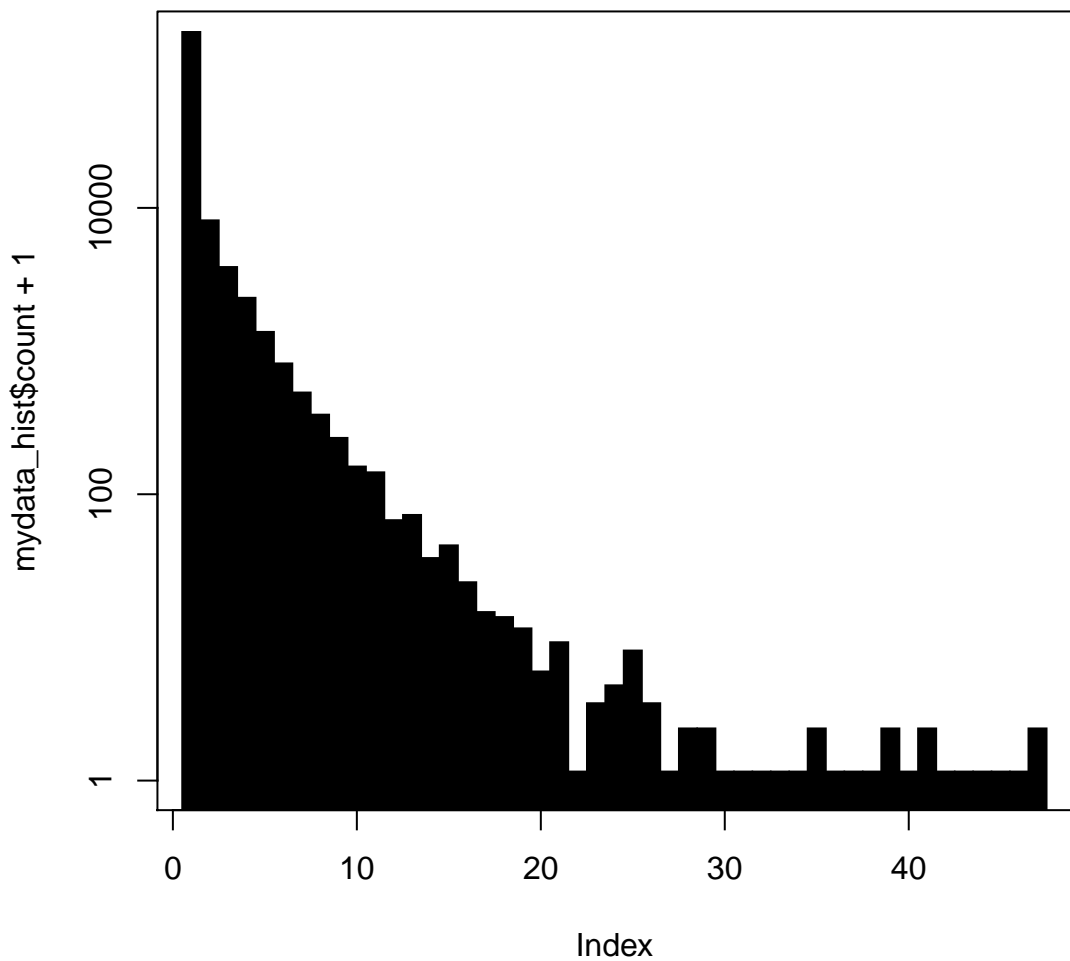
Histogram of rawM_nozero_max[rawM_0zero_num > 50 & kstwside



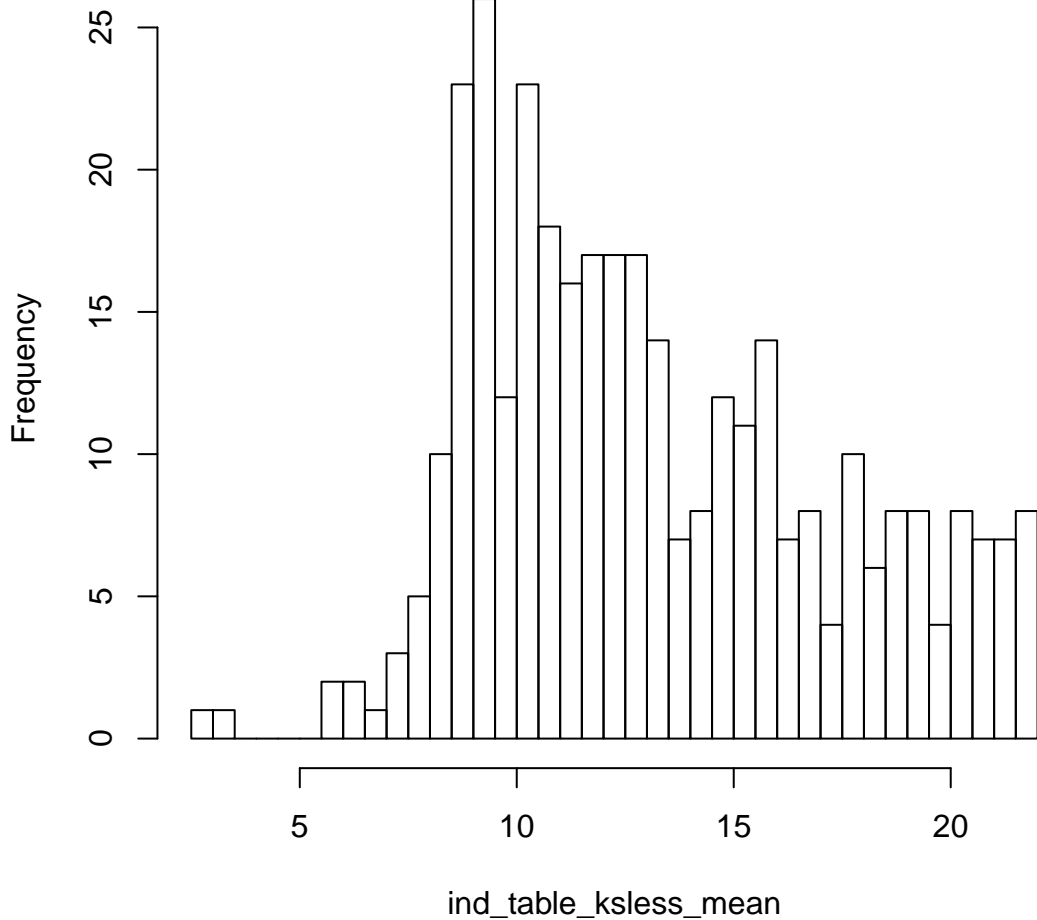
genes $\log(\text{expression} + 1)$ with least 50 cell expression and kstwosi



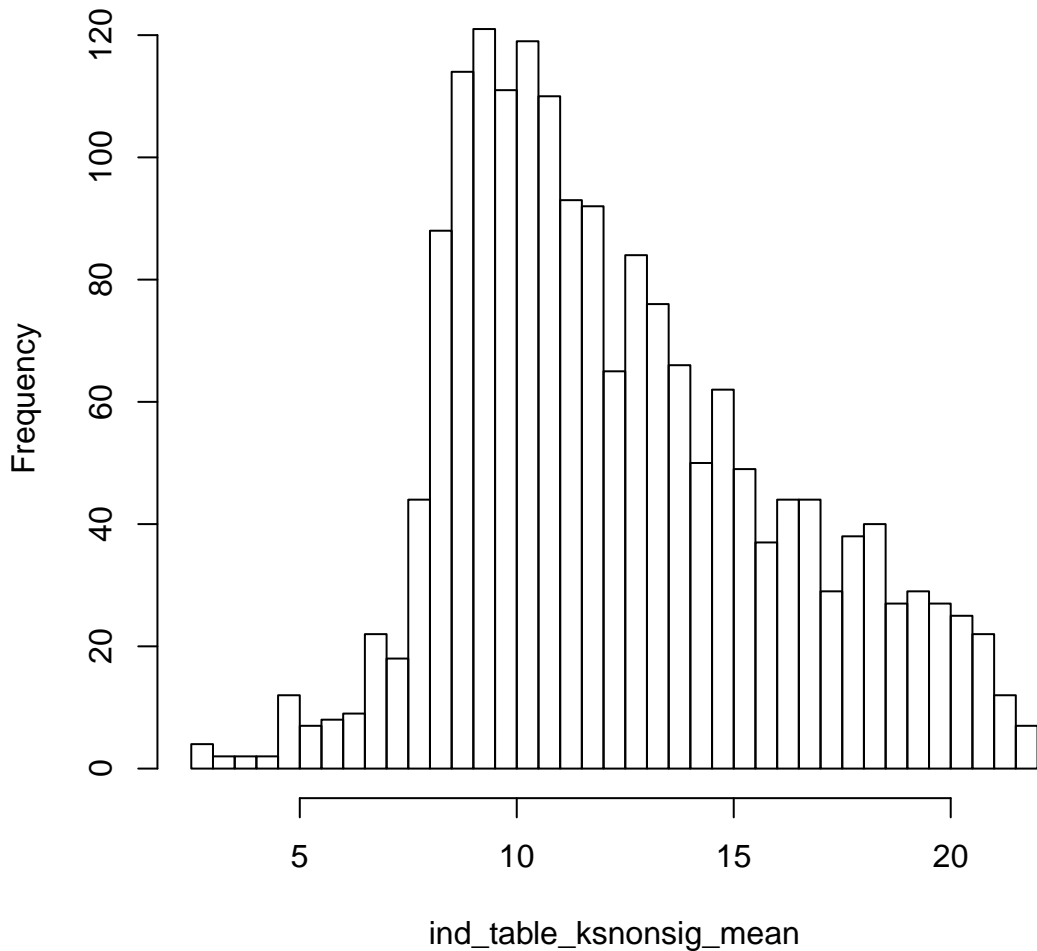
nes $\log(\text{expression} + 1)$ with least 50 cell expression and kstwsic



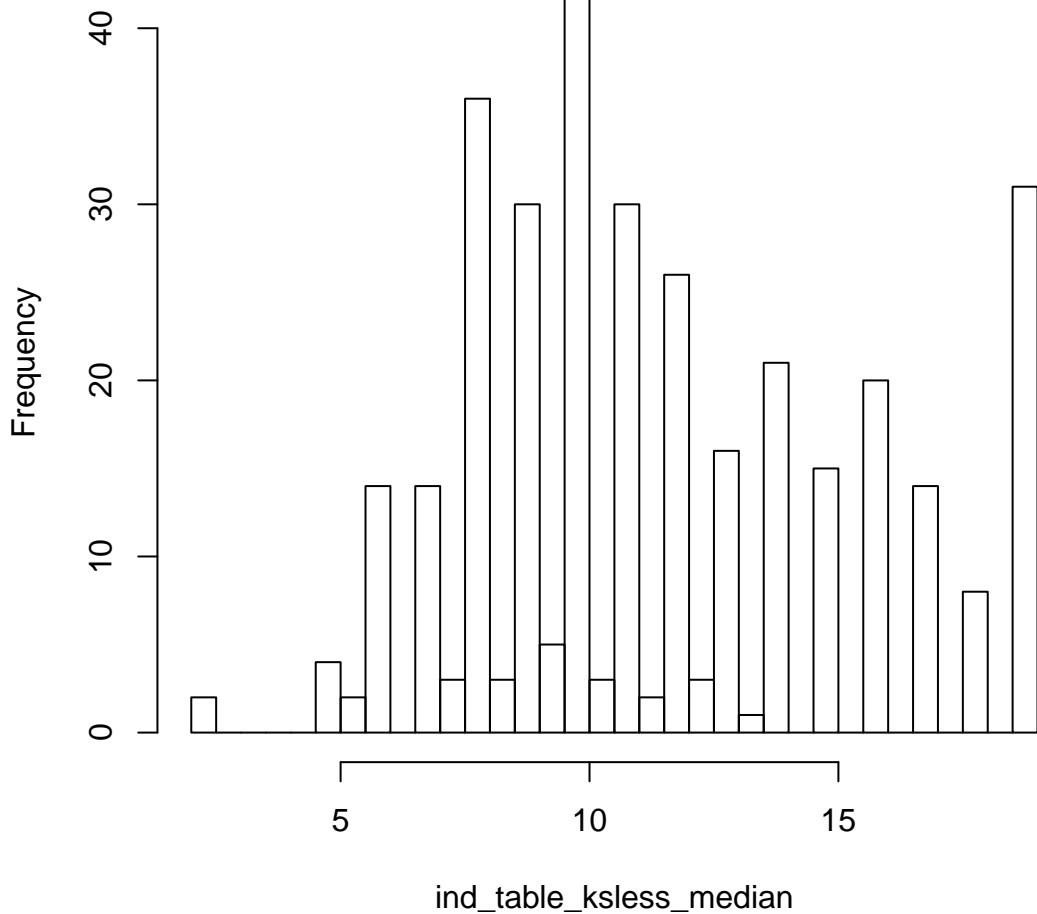
Histogram of ind_table_ksless_mean



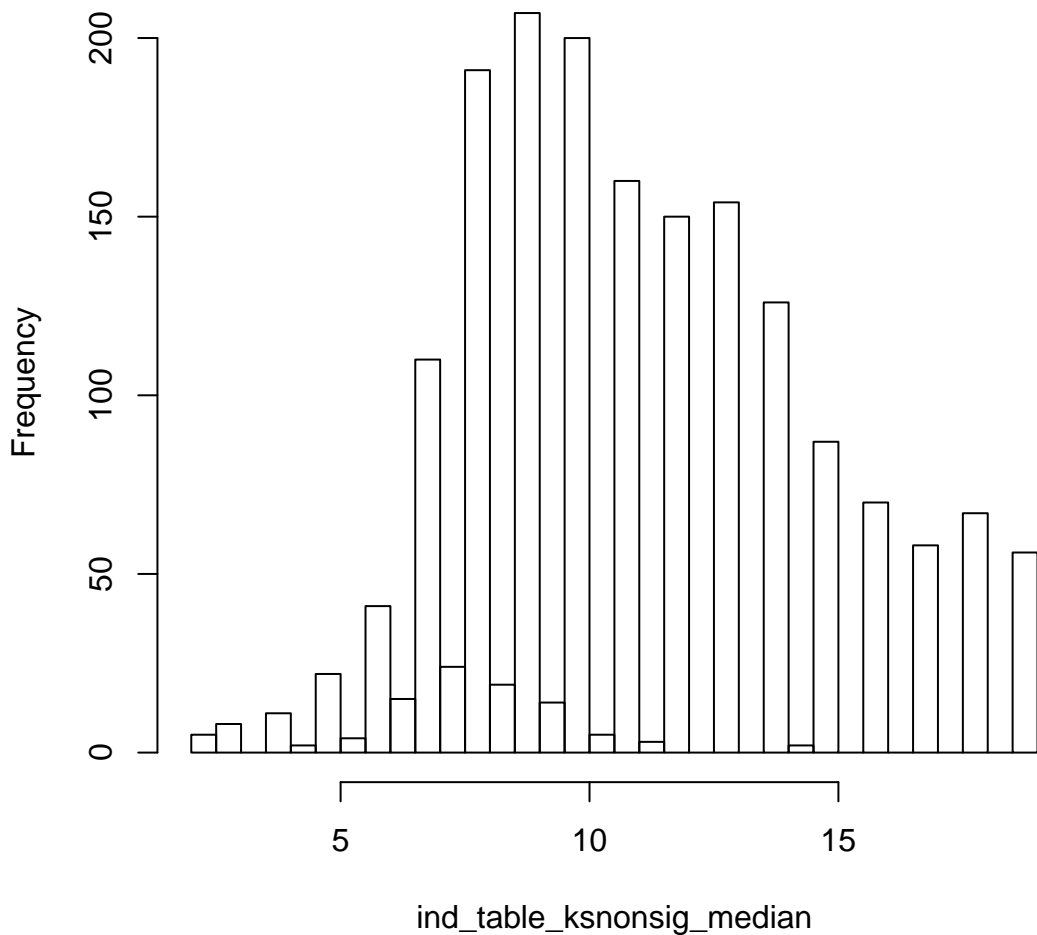
Histogram of ind_table_ksnonsig_mean



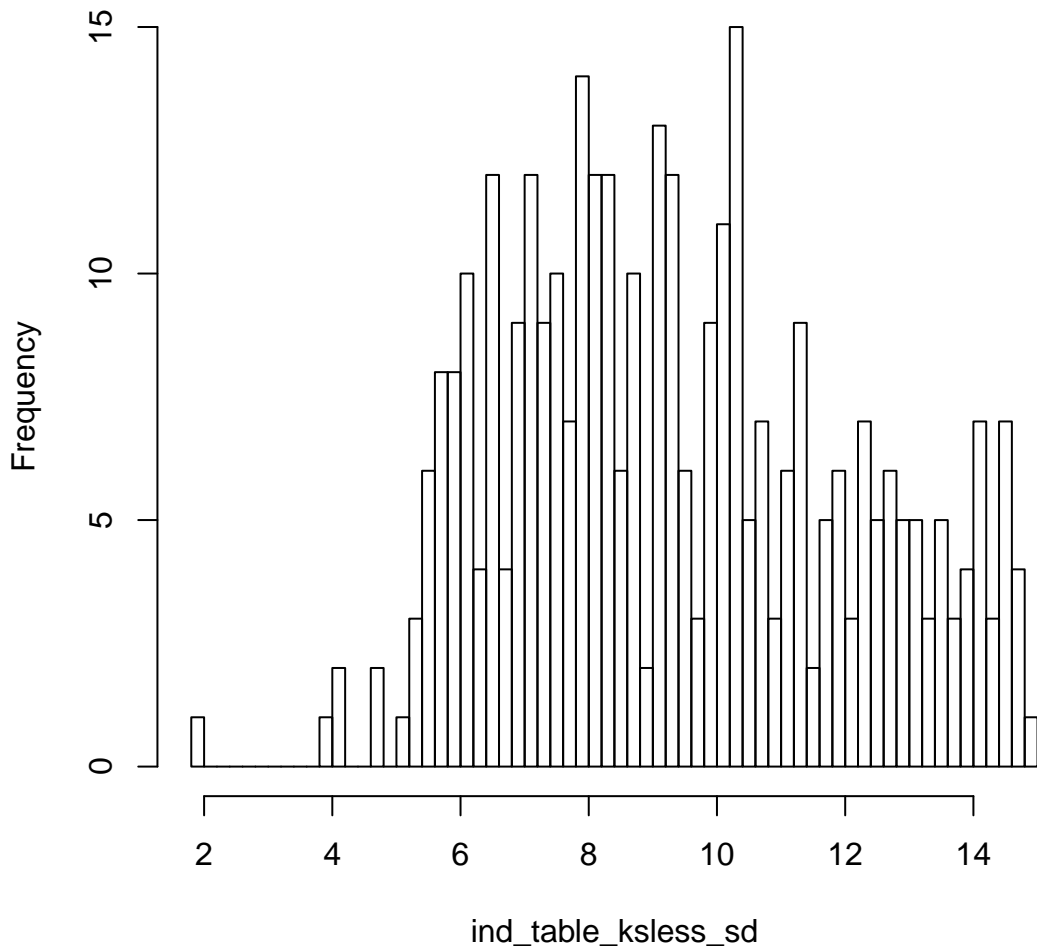
Histogram of ind_table_ksless_median



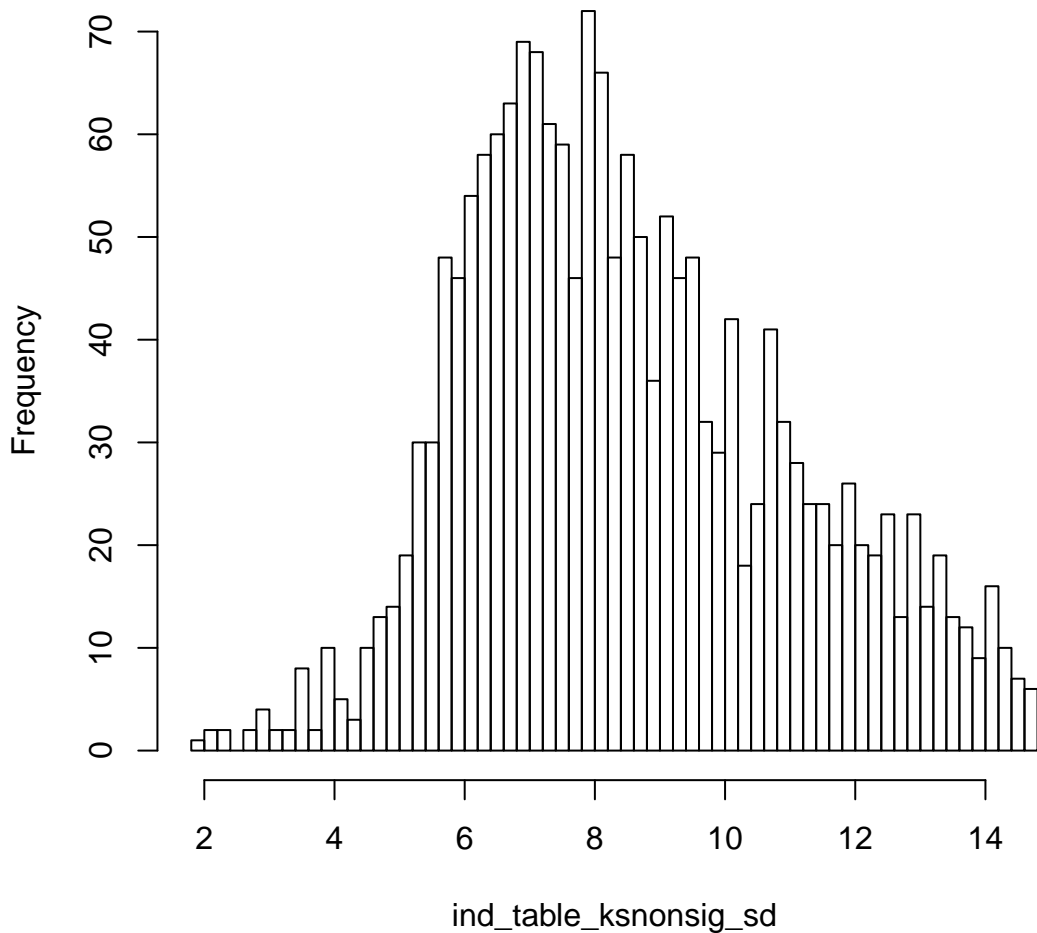
Histogram of ind_table_ksnonsig_median



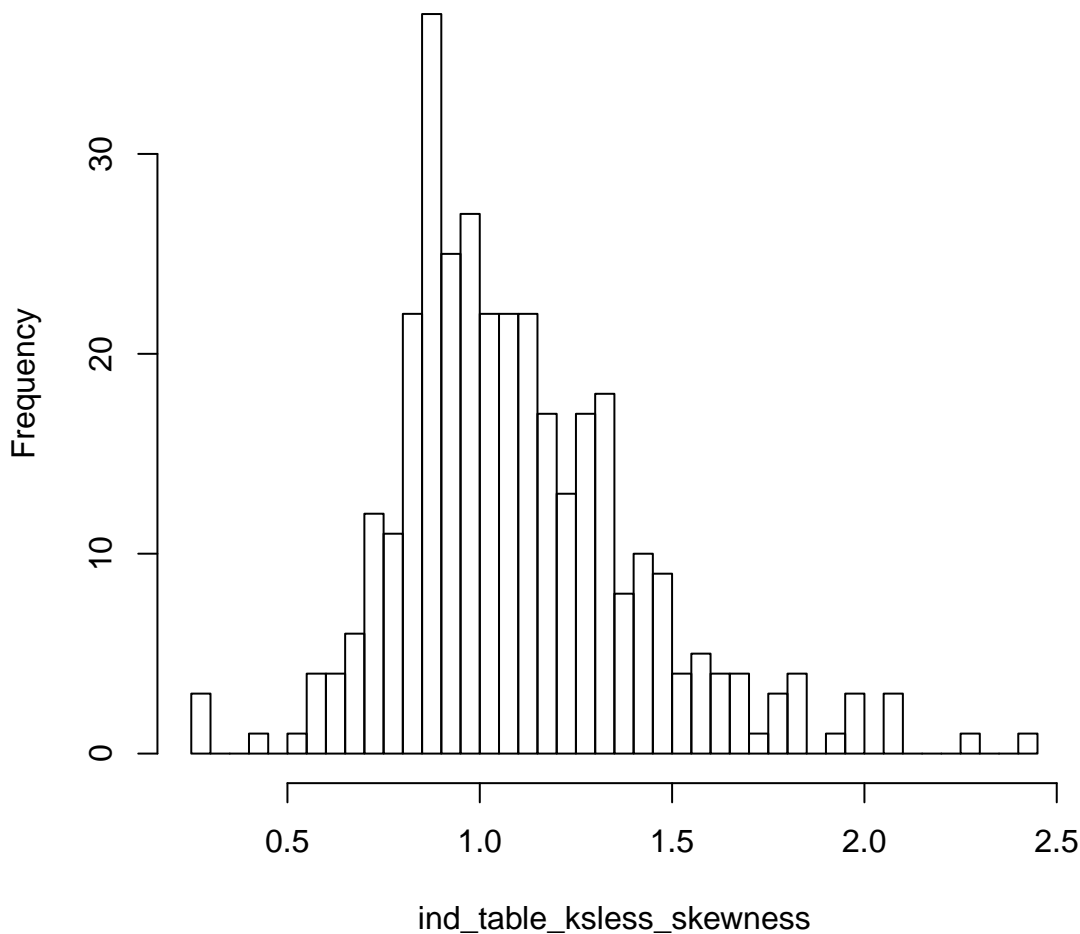
Histogram of ind_table_ksless_sd



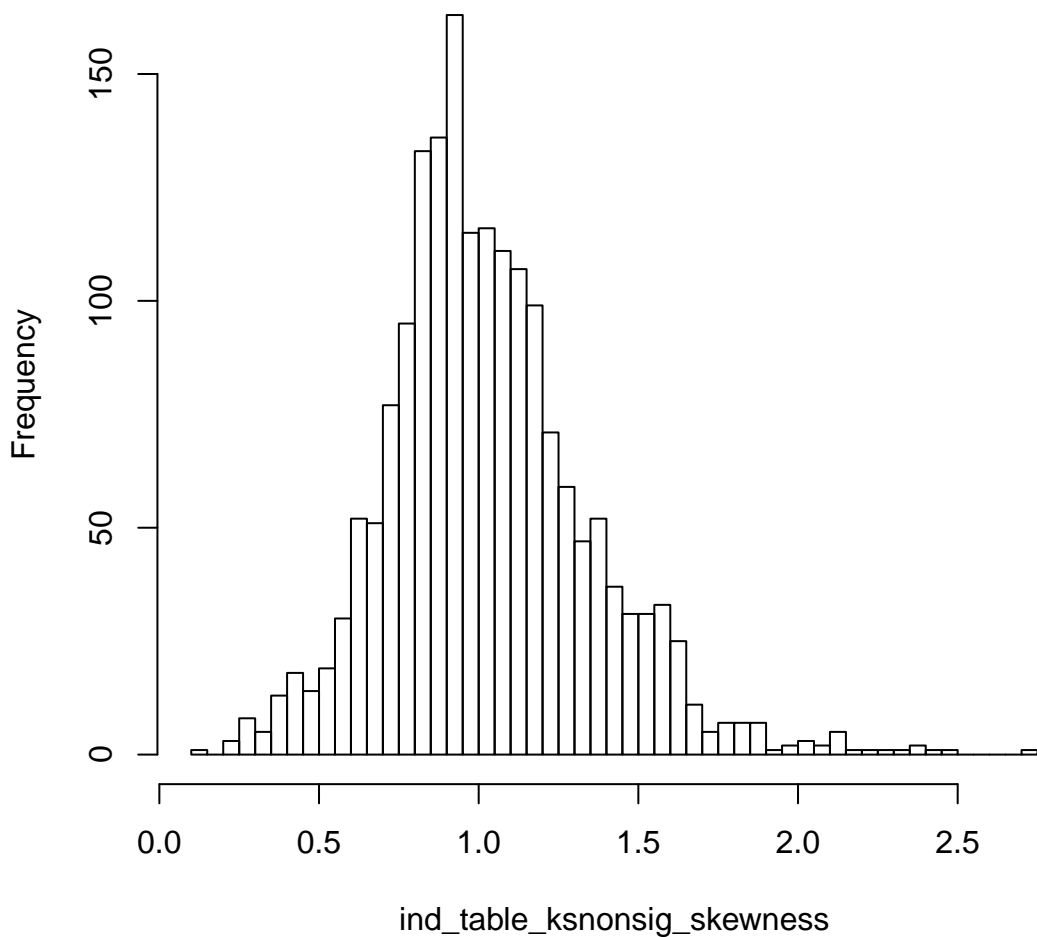
Histogram of ind_table_ksnonsig_sd



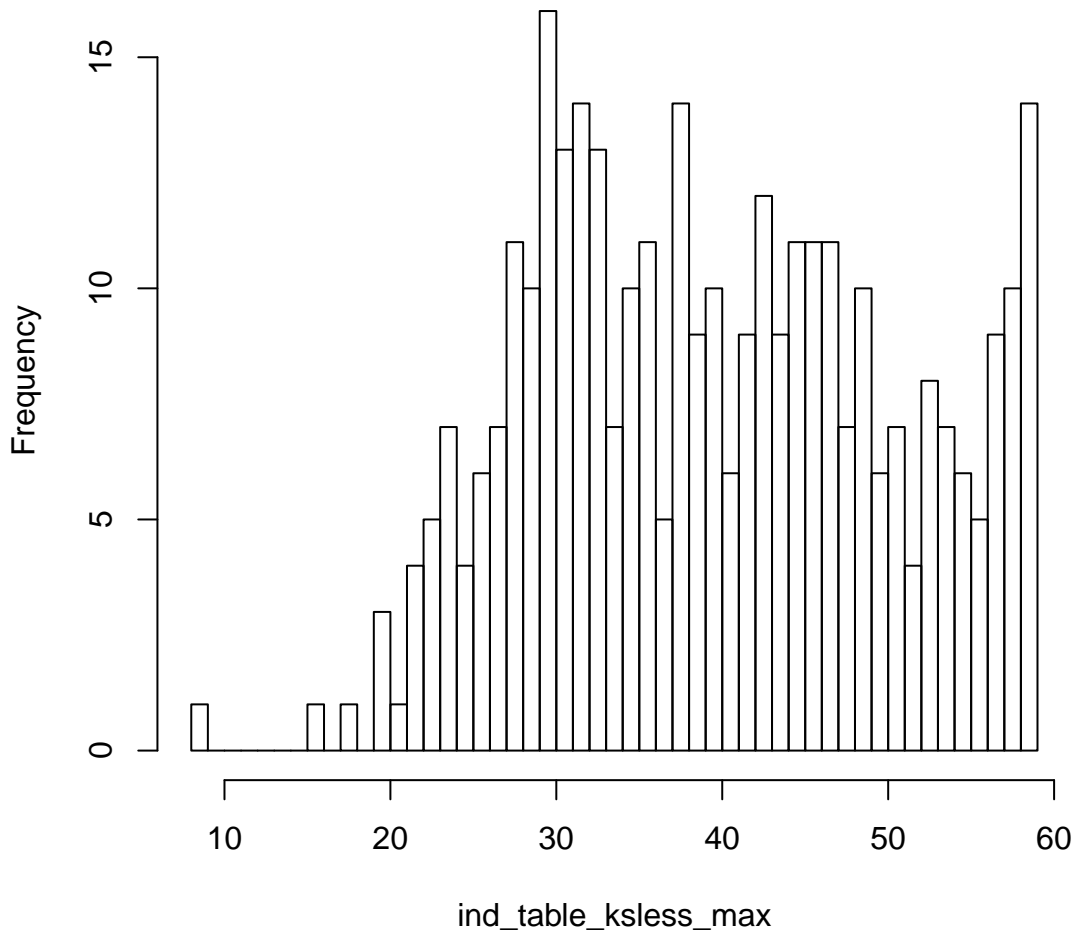
Histogram of ind_table_ksless_skewness



Histogram of ind_table_ksnonsig_skewness



Histogram of ind_table_ksless_max



Histogram of ind_table_ksnonsig_max

