iClust 1: N = 140 iClust 2: N = 72 GLA|ILMN\_1766637 (ER binding) GLA|ILMN\_1766637 (ER binding) [<=60] p = 0.0076555 No detectable trend: [<=60] p = 0.55951No detectable trend: 16 16 [>60] p = 0.26659 |FC|<1.25 or adjPval>0.01 [>60] p = 0.55637|FC|<1.25 or adjPval>0.01 [AII] p = 0.047013[AII] p = 0.310634 4 Raw Expression (4, 16) Raw Expression (4, 16) 12 12 10 10 ω ω 9 9 20 40 60 80 100 20 40 60 80 100 Age at diagnosis Age at diagnosis iClust 3: N = 294 iClust 4: N = 344 GLA|ILMN\_1766637 (ER binding) GLA|ILMN\_1766637 (ER binding) [<=60] p = 0.014648No detectable trend: [<=60] p = 0.7794No detectable trend: 16 16 [>60] p = 0.084637|FC|<1.25 or adjPval>0.01 [>60] p = 0.99327|FC|<1.25 or adjPval>0.01 [AII] p = 0.015452[AII] p = 1.3917e - 074 4 Raw Expression (4, 16) Raw Expression (4, 16) 12 12 19 10 ω ω 9 9 20 40 60 80 100 20 40 60 80 100

Age at diagnosis

Age at diagnosis

iClust 5: N = 191 iClust 6: N = 86 GLA|ILMN\_1766637 (ER binding) GLA|ILMN\_1766637 (ER binding) [<=60] p = 0.093734No detectable trend: [<=60] p = 0.18632No detectable trend: 16 16 [>60] p = 0.22802 [>60] p = 0.60168|FC|<1.25 or adjPval>0.01 |FC|<1.25 or adjPval>0.01 [AII] p = 0.23784[AII] p = 0.432144 4 Raw Expression (4, 16) Raw Expression (4, 16) 12 12 10 10 ω ω 9 9 20 40 60 80 100 20 40 60 80 100 Age at diagnosis Age at diagnosis iClust 7: N = 193 iClust 8: N = 300 GLA|ILMN\_1766637 (ER binding) GLA|ILMN\_1766637 (ER binding) [<=60] p = 0.20624No detectable trend: [<=60] p = 0.010636No detectable trend: 16 16 [>60] p = 0.70777|FC|<1.25 or adjPval>0.01 [>60] p = 0.2567|FC|<1.25 or adjPval>0.01 [AII] p = 0.074052[AII] p = 2.9749e-084 4 Raw Expression (4, 16) Raw Expression (4, 16) 12 12 10 10 ω ω 9 9 20 40 60 80 100 20 40 60 80 100 Age at diagnosis Age at diagnosis

iClust 9: N = 146 GLA|ILMN\_1766637 (ER binding)

iClust 10: N = 226 GLA|ILMN\_1766637 (ER binding)

