iClust 1: N = 140 iClust 2: N = 72 PAMR1|ILMN_1658356 (non-ER binding) PAMR1|ILMN_1658356 (non-ER binding) [<=60] p = 0.14564No detectable trend: [<=60] p = 0.96033No detectable trend: 16 16 [>60] p = 0.72811 [>60] p = 0.11908 |FC|<4 or adjPval>0.01 |FC|<4 or adjPval>0.01 [AII] p = 0.020188[AII] p = 0.219234 4 Raw Expression (4, 16) Raw Expression (4, 16) 12 12 10 10 ∞ ∞ 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 PAMR1|ILMN_1658356 (non-ER binding) PAMR1|ILMN_1658356 (non-ER binding) [<=60] p = 0.51251No detectable trend: [<=60] p = 0.90341No detectable trend: 16 16 [>60] p = 0.043027|FC|<4 or adjPval>0.01 [>60] p = 0.0059713 |FC|<4 or adjPval>0.01 [AII] p = 1.8043e - 06[AII] p = 7.0888e - 084 4 Raw Expression (4, 16) Raw Expression (4, 16) 12 12 10 10 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 PAMR1|ILMN_1658356 (non-ER binding) PAMR1|ILMN_1658356 (non-ER binding) [<=60] p = 0.21598 No detectable trend: [<=60] p = 0.042868No detectable trend: 16 16 [>60] p = 0.83685[>60] p = 0.14518 |FC|<4 or adjPval>0.01 |FC|<4 or adjPval>0.01 [AII] p = 0.001438[AII] p = 0.0265394 4 Raw Expression (4, 16) Raw Expression (4, 16) 12 12 10 10 ∞ ∞ 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 PAMR1|ILMN_1658356 (non-ER binding) PAMR1|ILMN_1658356 (non-ER binding) [<=60] p = 0.31136No detectable trend: [<=60] p = 0.10418No detectable trend: 16 16 [>60] p = 0.23998 |FC|<4 or adjPval>0.01 [>60] p = 0.00065343 |FC|<4 or adjPval>0.01 [AII] p = 0.0072666[AII] p = 2.8597e - 104 4 Raw Expression (4, 16) Raw Expression (4, 16) 12 12 10 10 ∞ ∞ 9 9 20 40 60 80 100 20 40 60 80 100 Age at diagnosis Age at diagnosis

iClust 9: N = 146 PAMR1|ILMN_1658356 (non-ER binding)

iClust 10: N = 226 PAMR1|ILMN_1658356 (non-ER binding)

