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Supplemental Information

Potential Role of miRNAs as Theranostic

Biomarkers of Epilepsy

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Supplementary information

miRNA	Gene target
<i>miR-15a-5p</i>	APP, ATF2, BCL2, CHUK, HSP90B1, IKBKG, and JUN
<i>miR-106b-5p</i>	ANAPC7, AP1G1, AP2B1, CD34, CDC42, CDKN1A, CLTC, HUWE1, KIF23, PIK3AP1, PSMA3, PTEN, TRIP12, and YES
<i>miR-146</i>	CD40LG, CDKN1A, CFH, FADD, ICAM1, IFI27, IFIT1, IFIT3, IFITM1, IFITM3, IRAK1, IRAK2, IRF7, ISG15, ITGB2, KIF22, MX2, OASL, OSBPL1A, RAC1, SIKE1, STAT1, TLR2, TLR4, and TRAF6
<i>miR-451</i>	AKT1, BCL2, IKBKB, IL6R, and UBE2H

Table S1 Summary of genes that are target of epilepsy-associated miRNA in neuroinflammation pathway.

miRNA	Gene target
<i>miR-15a-5p</i>	ACTR1A, BRCA1, BTRC, CCND1, CCND2, CCNE1, CDC25A, CENPJ, CEP63, HIST1H2BK, PRIM1, PSMC4, TP53
<i>miR-34a</i>	CCND1, CDK6, E2F3, MYC
<i>miR-106b-5p</i>	ANAPC7, CCND1, CCND2, CDKN1A, E2F1, E2F3, E2F5, RB1, RBL1, RBL2, WEE1
<i>miR-146</i>	CCNA2, CDKN1A, SMAD2, SMAD4

Table S2 Summary of genes that are target of epilepsy-associated miRNA in neurogenesis, cell cycle control and cell proliferation.

miRNA	Gene target
<i>miR-15a-5p</i>	AKT3, BCL2, CHUK, IKBKG, NFKB1, TP53
<i>miR-106b-5p</i>	ACIN1, APC, BCL2L11, CASP7, CASP8, E2F1, PSMA3
<i>miR-146</i>	FADD, FAS, IRAK1, IRAK2, NFKB1
<i>miR-451</i>	AKT1, BCL2, IKBKB

Table S3 Summary of genes that are target of epilepsy-associated miRNA in apoptosis.