

Key resources table

REAGENT or RESOURCE	SOURCE	IDENTIFIER
Antibodies		
Caspase 1/p20/p10 Polyclonal antibody	Proteintech	Cat#22915-1-AP
Caspase-1 (D7F10) Rabbit mAb	Cell Signaling Technology	Cat#3866T
Caspase-1 Polyclonal Antibody	Immunoway	Cat#YT5743
IL-18 Polyclonal antibody	Proteintech	Cat#10663-1-AP
Gasdermin D (E9S1X) Rabbit mAb	Cell Signaling Technology	Cat#39754S
GSDMD antibody	Affinity	Cat#AF4012
GSDMD rabbit pAb	Immunoway	Cat#YT7991
Cleaved-IL-1 β (Asp116) (D3A3Z) Rabbit mAb	Cell Signaling Technology	Cat#83186S
IL-1 beta Antibody	Affinity	Cat#AF5103
NLRP3 Antibody	Affinity	Cat#DF7438
NLRP3 Polyclonal Antibody	Proteintech	Cat#19771-1-AP
Anti-Estrogen Related Receptor alpha Antibody [EPR46Y]	ABCAM	Cat#ab76228
Anti-Estrogen Related Receptor alpha Antibody	ABCAM	Cat#ab137489
Anti-Estrogen Related Receptor alpha Antibody	ABCAM	Cat#ab150560
ERR α Antibody (2ERR7)	Santa Cruze	Cat#sc-65720
HIF-1 α Polyclonal Antibody	Proteintech	Cat#20960-1-AP
β -actin Monoclonal Antibody(5B7)	Immunoway	Cat#YM3028I
β -Tubulin Monoclonal Antibody	Immunoway	Cat#YM3030
IPKine™ HRP, Mouse Anti-Rabbit IgG LCS	ABBKINE	A25022-100ul
GAPDH Monoclonal Antibody(2B8)	Immunoway	Cat#YM3029
HRP Goat Anti-Mouse IgG (H+L) Antibody	Apexbio	Cat#K1221
HRP Goat Anti-Rabbit IgG (H+L) Antibody	Apexbio	Cat#K1223
Bacterial and virus strains		
LV-ESRRA-RNAi(55367-1)	genechem	GIDL0327432
LV-ESRRA(71058-1)	genechem	GOSL0293986
Biological samples		
Patient-derived organoid	Fujian Maternity and Child Health Hospital	N/A
Patient-derived clinical data resource	TCGA	https://cancergenome.nih.gov/
Chemicals, peptides, and recombinant proteins		
TRNzol Universal	Tiagen	DP424
HyAgarose LE,Multi-purpose Agarose	HydraGene	R9012-100g
GoodView™	sbsgenetech	HGV-II
GoScript™ Reverse Transcription Mix, Oligo(dT)	PROMEGA	A2791
Eastep QPCR Master Mix (2*)	PROMEGA	LS2062
100 bp DNA Ladder	Tiagen	MD109-01
TAE Buffer,50×	Solarbio	T1060
MCC950 sodium	Apexbio	B7946-10mg
XCT790	Apexbio	B3238-10mg
Cobalt Chloride Solution 0.5M	Macklin	C885204-100ml
Cisplatin	Meilune	MB1055

Puromycin	Meilunbio	MA0318
ProteinA/ G	SANTA	SC-2003
Rabbit IgG	YEASEN	36113ES10
Protein Free Rapid Blocking Buffer(5×)	EpiZyme	PS108
Antibody Dilution Buffer	Meilune	MB9867
Protease Inhibitor Cocktail (EDTA-Free,100× in DMSO)	MCE	HY-K0010
Protease Inhibitor Cocktail(100×, EDTA-free)	EpiZyme	GRF101
M-PER™ Mammalian Protein Extraction Reagent	Thermo	78501
McCoy's 5A medium	Keygen bioTECH	KGM4892-500
RPMI-1640 medium	Keygen bioTECH	KGM31800-500
StableCell™DMEM	SIGMA	D0822
Roswell Park Memorial Institute 1640 medium	SIGMA	R8758-500ML
OPTI-MEM(R) I Reduced Serum Medium (1X)	Thermo	31985-070
phosphate buffered solution (10X)	Solarbio	P1022
DMSO (DIMETHYL SULFOXIDE)	MP	0219605580
Lipofectamine 3000 Transfection Reagent	Thermo	L3000001
Fetal Bovine Serum	Gibco	10091148
Penicillin-Streptomycin	Thermo	BS-F-15140122
0.25%Trypsin-EDTA,no Phenol Red(modified)	Meilunbio	MA0232
Corning® Matrigel® Basement Membrane Matrix, LDEV-Free	Corning	354234
Tris (Hydroxymethyl) Aminomethane	Solarbio	T8060-500g
1M Tris-HCl (pH6.8)	Solarbio	T1020-100ml
1M Tris-HCl (pH 8.8)	Solarbio	T1170-100ml
20×TBS	Solarbio	T1080
30%Acr/Bis(29:1)Glue making solution	Solarbio	A1010-500ML
5X Protein Loading Buffer(No Reducing Buffer)	Sangon Biotech	C516031-0005
Bradford Protein Assay Kit	Beyotime	P0006
Glycine	Solarbio	G8200-500
XF Base Medium Miniman DMEM	Agilent Technologies	103334-100
XF RPMI Medium	Agilent Technologies	1003576-100
XF DMEM medium, pH 7.4	Agilent Technologies	103575-100
XF Calibrant	Agilent Technologies	100840-000
XF 200 mM Glutamine Solution,	Agilent Technologies	103579-100
Omni-Easy™Protein Sample Loading Buffer (Denaturing,Reducing,5×)	EpiZyme	LT101L
Omni-Flash™Western Blot Rapid Transfer Buffer (10×)	EpiZyme	PS201
Omni-PAGE™Hepes-Tris Gels (4~20%,10 wells)	EpiZyme	LK206
PAGE gel accelerator	Solarbio	T8090-100ml
Omni-Easy™Protein Sample Loading Buffer (Denaturing,Reducing,5×)	EpiZyme	ZP-LT101S
TBS/Tween Buffer (10×)	EpiZyme	PS103
Primary Antibody Dilution Buffer for Western Blot	EpiZyme	PS114
WesternBright ECL	Advansta	K-12045-D10
Cell lysis buffer for Western and IP	Beyotime	P0013
Multicolor Prestained Protein Ladder	EpiZyme	WJ103L
Transfer Buffer(10×)	EpiZyme	PS109S
defatted milk powder	EpiZyme	PS112L
Tween-20	Solarbio	T8220-500ml

Sodium dodecylsulfate	Solarbio	S8010-100g
Critical commercial assays		
Eastep™ Total RNA Super Extraction Kit	PROMEGA	LS1040
Lactate dehydrogenase (LDH) Activity Assay Kit (WST-8 method)	ELABSCIENCE	E-BC-K766-M
AnnexinV-PE/7-AAD Apoptosis Detection Kit	Meilune	MA0429-2
Hoechst 33342/PI Double Stain Kit	Solarbio	CA1120-100T
Omni-Easy™One-Step PAGE Gel Fast Preparation Kit (10%)	EpiZyme	PG212
Omni-Easy™One-Step PAGE Gel Fast Preparation Kit (12.5%)	EpiZyme	PG213
Omni-Easy™Instant BCA Protein Assay Kit	EpiZyme	ZJ102
XF Glycolysis Stress Test Kit	Agilent Technologies	103020-100
Cell Counting Kit-8 (CCK-8)	Apexbio	K1018-5ml
Classic Magnetic Protein A/G IP/Co-IP Kit	EpiZyme	YJ201
Duo-Lite Luciferase Assay System	Vazyme	DD1205-01
Experimental models: Cell lines		
Human endometrial adenocarcinoma cell: KLE	Keygen bioTECH	KG627
Human endometrial adenocarcinoma cell: HEC-1A	Keygen bioTECH	KG626
293T	Keygen bioTECH	KG405
Experimental models: Organisms/strains		
BALB/c Nude Mice	Charles River	401
Oligonucleotides		
Primer for human ERR α Forward: ACCGAGAGATTGTGGTCACCA Reverse: CATCCACACGCTCTGCAGTACT	Fuzhou Sunya Biotechnology Co.,LTD	N/A
Primer for human GLUT1: Forward:TCTGGCATCAACGCTGTCTT Reverse: CCGTGTTGACGATACCGGAG	Fuzhou Sunya Biotechnology Co.,LTD	N/A
Primer for human PKM2: Forward:CCGCCTGGACATTGATTCAC Reverse: GTTCAGACGAGCCACATTCATT	Fuzhou Sunya Biotechnology Co.,LTD	N/A
Primer for human PDK1: Forward:ATCACCAGGACAGCCAATACA Reverse: CCTCGGTCATCTTCACA	Fuzhou Sunya Biotechnology Co.,LTD	N/A
Primer for human LDHA: Forward:GATTGAGCCCGATTCCGTTAC Reverse: AGAGACACCAGCAACATTCATTC	Fuzhou Sunya Biotechnology Co.,LTD	N/A
Primer for human HK2: Forward:ATTGCCGAATGCCTGGCTAA Reverse: TTCCGGATCAGAGCCACAAC	Fuzhou Sunya Biotechnology Co.,LTD	N/A
Recombinant DNA		
ESRRA-CMV enhancer-MCS-SV40-puromycin (NM_004451)	genechem	N/A
NLRP3-CMV enhancer-MCS-SV40-puromycin (NM_004895-promoter)	genechem	N/A
NLRP3-MCS-firefly_Luciferase (NM_004895-promoter(-400~+21))	genechem	N/A

NLRP3-MCS-firefly_Luciferase (NM_004895-promoter(-800~+21))	genechem	N/A
NLRP3-MCS-firefly_Luciferase (NM_004895-promoter(-800~+21)-MUT)	genechem	N/A
NLRP3-MCS-firefly_Luciferase (NM_004895-promoter(-1200~+21)-MUT)	genechem	N/A
TK-promoter-Renilla-luciferase	genechem	N/A
Software and algorithms		
ImageJ	NIH	https://imagej.nih.gov/ij/
FlowJo	BD	https://www.flowjo.com/
GraphPad Prism 8.0 software	GraphPad Software	https://www.graphpad.com/scientific-software/prism/
Seahorse Wave Controller software	Seahorse/Agilent	https://www.agilent.com/en/products/cell-analysis/cell-analysis-software/instrument-software/wave-controller-2-4