

Supplementary information

Title: Meiotic arrest with roscovitine and follicular fluid improves cytoplasmic maturation of porcine oocytes by promoting chromatin de-condensation and gene expression

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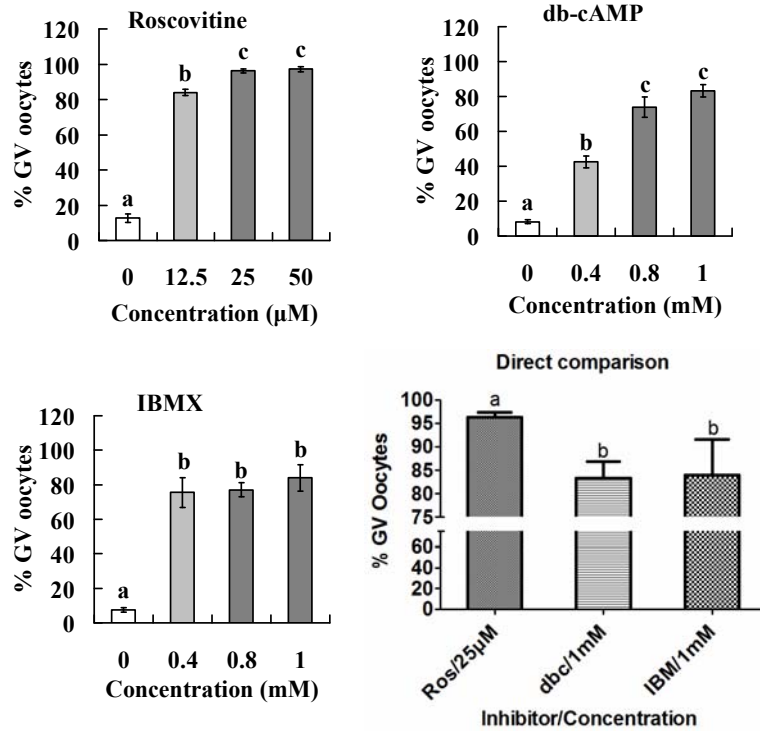
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Supplementary figure and table legends

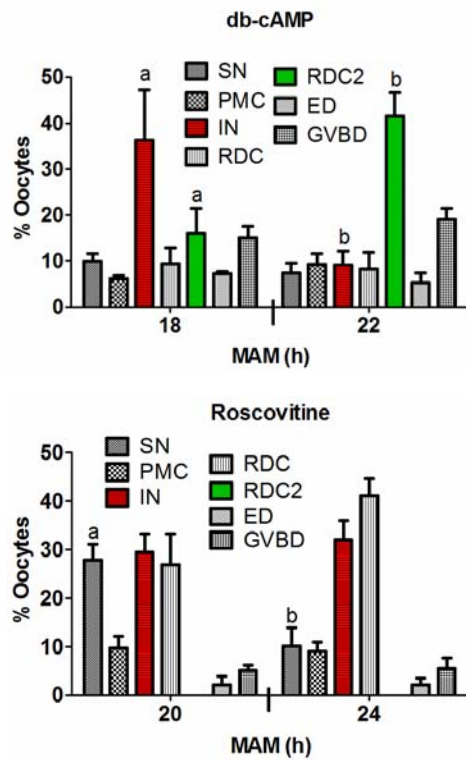
Supplementary Figure S1. Percentages of GV-intact oocytes after MAM for 24 h in the MEM medium containing different concentrations of roscovitine, db-cAMP or IBMX. Each treatment was repeated 4-5 times with each replicate including about 30 oocytes. a-c: Values with a different letter above bars differ significantly ($P < 0.05$).

Supplementary Figure S2. Percentages of oocytes with different chromatin configurations after MAM culture in 199+FF containing 1 mM db-cAMP for 18 h or 20 h or roscovitine for 20 h or 24 h. Each treatment was repeated 5-6 times and each replicate contained 20-30 oocytes. a-c: Values with different letters above bars differ significantly ($P < 0.05$) within configurations.

Supplementary Table S1. Oligonucleotide primer sequences used for real-time PCR in this study.



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Supplementary Figure S2. Percentages of oocytes with different chromatin configurations after MAM culture in 199+FF containing 1 mM db-cAMP for 18 h or 20 h or roscovitine for 20 h or 24 h. Each treatment was repeated 5-6 times and each replicate contained 20-30 oocytes. a-c: Values with different letters above bars differ significantly ($P<0.05$) within configurations.

Supplementary Table S1. Oligonucleotide primer sequences used for real-time PCR in this study

cDNA	Oligonucleotide sequences (5'-3')	Amplified product size (bp)	Annealing temperature (°C)
β-actin	F: CGTGCGGGACATCAAGGA R: AGGAAGGAGGGCTGGAAGA	177	—
Pcna	F: AGAGGAGGAAGCAGTTACCAT R: CTGTAGGAGAGAGTGGAGTGG	104	58
Bax	F: CCAAGAAGTTGAGCGAGTGTC R: CGTCCCAAAGTAGGAGAGGA	335	58
Bcl2	F: AGGGCATTCAAGTGACCTGAC R: CGATCCGACTCACCAATACC	193	58
Nfe2l2	F: CCCATTCACAAAAGACAAACATTC R: GCTTTTGCCCTTAGCTCATCTC	72	58
Mater	F: AGCATCTCACCTCCCTCTTG R: AATCAATCCCTTCCACCTCA	116	60
Zar1	F: TGGTGTGTCCAGGGCACTAA R: GTCACAGGAGAGGCGTTTGC	213	62

F, Forward; R, Reverse.