

**Supplementary Table S5.** Primer sequences used for the RT-PCR of the in vitro model showing the effect of metformin on fibroblasts from women with POP (**Figure 2**).

| Target gene   |                    | Oligonucleotide sequence                                    | Annealing temperature (°C) | Product Size (bp) |
|---------------|--------------------|---|----------------------------|-------------------|
| <b>COL1A1</b> | Forward<br>Reverse | 5' TCCAACGAGATCGAGATCC 3'<br>5' AAGCCGAATTCCTGGTCT 3'       | 56.05<br>55.76             | 191               |
| <b>COL3A1</b> | Forward<br>Reverse | 5' GATCCGTTCTCTGCGATGAC 3'<br>5' AGTCTGAGGACCAGTAGGG 3'     | 58.52<br>57.76             | 279               |
| <b>ELN</b>    | Forward<br>Reverse | 5' TTTGGCCCGGGAGTAGTTGG 3'<br>5' CAGCTGCTTCTGGTGACACAAC 3'  | 62.13<br>62.2              | 136               |
| <b>YWHAZ</b>  | Forward<br>Reverse | 5' GATGAAGCCATTGCTGAACCTG 3'<br>5' CTATTTGTGGGACAGCATGGA 3' | 58.49<br>58.00             | 229               |
| <b>HPRT1</b>  | Forward<br>Reverse | 5' GCTGACCTGCTGGATTACAT 3'<br>5' CTTGCGACCTTGACCATCT 3'     | 57.66<br>57.46             | 260               |

*RT-PCR, reverse-transcription polymerase chain reaction; COL1A1,  $\alpha 1(I)$ procollagen; COL3A1,  $\alpha 1(III)$ procollagen; ELN, elastin; YWHAZ, tyrosine 3-monooxygenase /tryptophan 5-monooxygenase activation protein, zeta polypeptide; HPRT1, hypoxanthine phosphoribosyltransferase 1.*