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## *APPENDIX*

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## List of primers

| Sr no. | Gene name     | Primer sequence                  |                                   |
|--------|---------------|----------------------------------|-----------------------------------|
| 1.     | <i>Myog</i>   | <b>F:</b> CGGCTGCCTAAAGTGGAGAT   | <b>R:</b> CGAGCAAATGATCTCCTGGGT   |
| 2.     | <i>Insr</i>   | <b>F:</b> TTTGTCATGGATGGAGGCTA   | <b>R:</b> CCTCATCTTGGGGTTGAACT    |
| 3.     | <i>Irs1</i>   | <b>F:</b> TGTCACCCAGTGGTAGTTGCTC | <b>R:</b> CTCTCAACAGGAGGTTTGGCATG |
| 4.     | <i>Glut4</i>  | <b>F:</b> GCCTTCTTTGAGATTGGTCC   | <b>R:</b> CTGCTGTTTCCTTCATCCTG    |
| 5.     | <i>IL6</i>    | <b>F:</b> CTCTGCAAGAGACTTCCATCCA | <b>R:</b> GACAGGTCTGTTGGGAGTGG    |
| 6.     | <i>IL13</i>   | <b>F:</b> CACACAAGACCAGACTCCCC   | <b>R:</b> GTTGGTCAGGGAATCCAGGG    |
| 7.     | <i>IL15</i>   | <b>F:</b> CGCCCAAAGACTTGCAGTG    | <b>R:</b> GGTGGATTCTCTCTGAGCTGT   |
| 8.     | <i>IL10</i>   | <b>F:</b> CAGGACTTTAAGGGTACTTG   | <b>R:</b> ATTTTCACAGGGGAGAAATC    |
| 9.     | <i>CXCL1</i>  | <b>F:</b> ACCGAAGTCATAGCCACACTC  | <b>R:</b> CTCCGTTACTTGGGGACACC    |
| 10     | <i>CX3CL1</i> | <b>F:</b> GCGACAAGATGACCTCACGA   | <b>R:</b> TGTCGTCTCCAGGACAATGG    |
| 11     | <i>FGF21</i>  | <b>F:</b> GGAGATCAGGGAGGATGGAAC  | <b>R:</b> TGGCTGTTGGCAAAGAAACC    |
| 12     | <i>Actb</i>   | <b>F:</b> CTTCTGACCCATACCCACCA   | <b>R:</b> ATGGATGACGATATCGCTGC    |

| List of Antibodies |                              |                       |             |                     |                   |                                    |              |
|--------------------|------------------------------|-----------------------|-------------|---------------------|-------------------|------------------------------------|--------------|
| Sr. No.            | Antibody                     | Company & Catalog No. | Isotype IgG | Mono/ Polyclonal Ab | Mol. Weight (kDa) | Application                        | Dilution     |
| 1.                 | SGLT2                        | Abcam#37296           | Rabbit      | Polyclonal          | 74                | Immunoblotting/ Immunoflourescence | 1:1000/ 1:40 |
| 2.                 | PKC                          | Millipore# 07-264     | Rabbit      | Polyclonal          | 43                | Immunoblotting                     | 1:1000       |
| 3.                 | pp38MA PK                    | Cell Signalling #9216 | Mouse       | Monoclonal          | 43                | Immunoblotting                     | 1:1000       |
| 4.                 | ERK1/2                       | Cell Signalling #9102 | Rabbit      | Polyclonal          | 42                | Immunoblotting                     | 1:1000       |
| 5.                 | Desmin                       | Sigma#8281            | Rabbit      | Polyclonal          | 50-55             | Immunoblotting                     | 1:1000       |
| 6.                 | $\alpha$ Smooth muscle actin | Sigma#F3777           | Mouse       | Mono                | 42                | Immunofluorescence                 | 1:250        |
| 7.                 | Cpeptide                     | CST#4593              | Rabbit      | Mono                | 5                 | Immunofluorescence                 | 1:100        |
| 8.                 | Glucagon                     | Sigma#G2654           | Mouse       | Mono                | 3.48              | Immunofluorescence                 | 1:100        |
| 9.                 | Insulin Receptor $\beta$     | BD#611277             | Rabbit      | Mono                | 95                | Immunoblotting                     | 1:1000       |
| 10                 | IRS-1                        | CST#2381              | Rabbit      | Polyclonal          | 180               | Immunoblotting                     | 1:1000       |
| 11                 | Akt                          | CST#4691S             | Rabbit      | Monoclonal          | 60                | Immunoblotting                     | 1:1000       |
| 12                 | pAkt                         | CST#4060P             | Rabbit      | Monoclonal          | 60                | Immunoblotting                     | 1:1000       |
| 13                 | Caspase-3                    | Invitrogen #PA1-29157 | Rabbit      | Polyclonal          | 17,23             | Immunoblotting                     | 1:1000       |
| 14                 | Parp1                        | Santacruz# SC1561     | Mouse       | Polyclonal          | 116,89            | Immunoblotting                     | 1:1000       |

|    |                       |                                     |        |      |     |                    |         |
|----|-----------------------|-------------------------------------|--------|------|-----|--------------------|---------|
| 15 | HNF3B                 | DSHB#4C7                            | Mouse  | Poly | 48  | Immunoblotting     | 1:500   |
| 16 | NGN3                  | Sigma#SAB1306585                    | Rabbit | Poly | 23  | Immunoblotting     | 1:1000  |
| 17 | NeuroD1               | CST#4373                            | Rabbit | Mono | 49  | Immunoblotting     | 1:1000  |
| 18 | Nestin                | Sigma#N5413                         | Rabbit | Poly | 177 | Immunoblotting     | 1:1000  |
| 19 | PAX4                  | Sigma#AV32064                       | Rabbit | Mono | 25  | Immunoblotting     | 1:1000  |
| 20 | Nkx6.1                | DSHB#F64A6B4                        | Mouse  | Poly | 40  | Immunoblotting     | 1:40    |
| 21 | PDX1                  | BD#554655                           | Mouse  | Mono | 40  | Immunoblotting     | 1:1000  |
| 22 | GLUT-2                | Sigma#SAB1303865                    | Rabbit | Mono | 61  | Immunoblotting     | 1:1000  |
| 23 | MAF-A                 | Sigma#SAB2105099                    | Rabbit | Mono | 40  | Immunoblotting     | 1:1000  |
| 24 | Beta-Actin            | BD#612657                           | Mouse  | Mono | 42  | Immunoblotting     | 1:10000 |
| 25 | Nkx 6.1               | DSHB#F64A6B4                        | Mouse  | Poly | 40  | Immunoblotting     | 1:40    |
| 26 | Anti-Mouse-IgG-HRP    | Jackson ImmunoResearch #115-035-003 | Goat   | Poly |     | Immunoblotting     | 1:5000  |
| 27 | Anti-Rabbit-IgG-HRP   | Jackson ImmunoResearch #111-035-003 | Goat   | Poly |     | Immunoblotting     | 1:5000  |
| 28 | Anti-Mouse-IgG-FITC   | Sigma#F8771                         | Goat   | Poly |     | Immunofluorescence | 1:200   |
| 29 | Anti-Mouse-IgG-CF555  | Sigma#SAB4600299                    | Goat   | Poly |     | Immunofluorescence | 1:100   |
| 30 | Anti-Rabbit-IgG-CF555 | Sigma#SAB4600068                    | Goat   | Poly |     | Immunofluorescence | 1:100   |