

**Supplementary information, Table S1A.** Stable transmission of RS(tRNA)<sub>4x</sub> transgene from founder F0-1 to subsequent generations in mice.

Generation	No. of mice	No. of positive	Percentage (%)
<b>F1 (F0-1×WT)</b>	<b>3</b>	<b>1</b>	<b>33.3</b>
<b>F2 (F1×WT)</b>	<b>35</b>	<b>18</b>	<b>51.4</b>
<b>F3 (F2×WT)</b>	<b>17</b>	<b>7</b>	<b>41.2</b>

**Supplementary information, Table S1B.** Calculation of RS(tRNA)<sub>4x</sub> gene copy number in transgenic mice.

Sample	N <sub>RS(tRNA)<sub>4x</sub></sub>	N <sub>GAPDH</sub>	N <sub>RS(tRNA)<sub>4x</sub></sub> /N <sub>GAPDH</sub>	Copy number	Average
NO.1	463058.648619	28846.956524	16.1	16	15
NO.2	243827.676404	17507.642370	13.9	14	
NO.3	11096576.205261	812307.257330	13.6	14	
WT	21347.842991	833.379858	0.04	0	