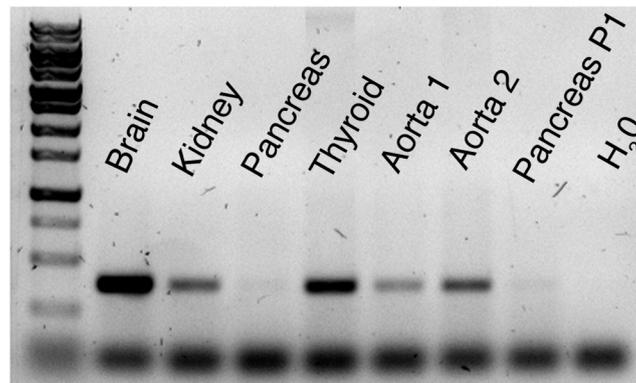


suppl. Figure S1

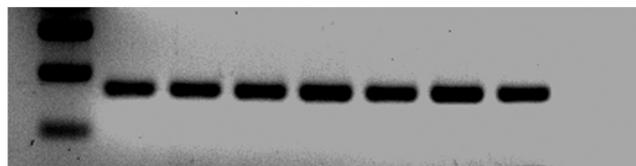
**supplementary Figure S1 Legend:**

**Expression of the *Slc4a8* gene encoding NDCBE.** In a multiple tissue northern blot from organs of adult wild-type mice probed with a *Slc4a8*-cDNA probe (nucleotides 777-1522 according to NM\_021530), transcripts were abundant in brain and testis, and detectable in several other tissues including the kidney. **b) Targeting of the *Slc4a8* locus.** The partial genomic structure of the *Slc4a8* gene is shown in the upper panel. The middle panel displays the targeted *Slc4a8* locus. A neomycin selection cassette flanked by loxP sites (grey arrows) was inserted into intron 11. A third loxP site was introduced into intron 12. Two correctly targeted ES cell clones were transiently transfected with a Cre-recombinase expression plasmid. ES cell clones with a Cre-mediated excision of the DNA fragment between the outer loxP sites (*lower panel*) were subsequently used for the generation of chimeric mice. **c) Verification of *Slc4a8* disruption.** Southern blot analysis of genomic DNA of wild-type (+/+), heterozygous (+/-) and knockout (-/-) mice. Northern blot analysis of wild-type (+/+), heterozygous (+/-) and knockout (-/-) brain tissue with the *Slc4a8*-cDNA probe as described in a) revealed no detectable residual aberrant transcripts in knockout tissue. A membrane protein immunoblot with a NDCBE-antibody confirmed the absence of NDCBE in brain homogenates of KO mice. Actin was used as a loading control.

## Ndcbe exons 5-8



## Gapdh



### Supplementary Figure S2

#### Analyzes of NDCBE transcripts by RT-PCR on various mouse tissue.

Semiquantitative PCR on cDNAs of various tissues reveals strong expression of NDCBE in brain, kidney and thyroid and to a lesser extent in the aorta. NDCBE transcripts could not be detected in the pancreas of newborn (P1) or adult mice. GAPDH served as a loading control. Total RNA was isolated from different mouse using trizol (Invitrogen). Reverse transcription of total RNA (1  $\mu$ g) was performed using standard protocols with random hexanucleotide primers and Superscript II reverse transcriptase (Invitrogen). Semiquantitative PCR was performed using intron spanning primers with the following sequences : NDCBE Exon 5-8 forw 5'-cgtgcaagtagcatagaggag-3', rev 5'-gtatccacctctcccaccag-3' ,GAPDH forw 5'- caacagcaactcccactcttc-3' and rev 5'- aaggagtaagaaacctggacc-3'.