

CLAIMS

1. An adeno-associated vector (AAV) comprising:
- a first expression cassette comprising a first nucleic acid encoding RdCVF
5 and
- a second expression cassette comprising a second nucleic acid encoding RdCVFL,
wherein said first and second expression cassettes display less than 200 contiguous
identical nucleotides.
- 10 2. An AAV according to claim 1, wherein the AAV is a serotype AAV2/8.
3. An AAV according to any one of claims 1 or 2, wherein the first nucleic acid
encoding RdCVF is under the control of an ubiquitous promoter, preferably the
CMV/CBA promoter.
- 15 4. An AAV according to any one of claims 1 to 3, wherein the second nucleic acid
encoding RdCVFL is under the control of the cone-opsin promoter.
5. An AAV according to any one of claims 1 to 4, wherein the AAV has a nucleic
20 acid sequence as set forth in the group consisting of SEQ ID NO: 6, SEQ ID NO: 7, SEQ
ID NO: 8 and SEQ ID NO: 9, preferably SEQ ID NO: 6.
6. An AAV according to any one of claims 1 to 4, wherein the AAV further
comprises a stuffer sequence of SEQ ID NO:10.
- 25 7. An AAV according to any of the above claims, wherein said AAV is for use in a
method of treatment of a retinal neurodegenerative disorder.
8. A method for treating a patient suffering from a retinal degenerative disease
30 comprising the step consisting of administering to said patient a therapeutically effective
amount of an adeno-associated vector (AAV) comprising:

- a first expression cassette comprising a first nucleic acid encoding RdCVF
 - and
 - a second expression cassette comprising a second nucleic acid encoding RdCVFL,
- 5 wherein said first and second expression cassettes display less than 200 contiguous identical nucleotides.

9. An AAV comprising a nucleic acid having the sequence set forth in SEQ ID NO:10, wherein said nucleic acid having the sequence as set forth in SEQ ID NO:10 is
- 10 not present in an expression cassette.