CLAIMS

1. An isolated or purified antisense oligomer for modifying pre-mRNA splicing in the CNOT3 gene transcript or part thereof, wherein the antisense oligomer is selected from the list comprising: SEQ ID NOs:4, 7-9, 11, 14-18, 26, 27, 30-35, 39, 40, 44-48, 53-57, 59, 60, 64, 67, 69, 70, and 72-74.

~~2. The antisense oligomer of claim 1 that induces non-productive splicing or functional impairment in the CNOT3 gene transcript or part thereof.~~

~~3. The antisense oligomer of claim 1 selected from the list comprising: SEQ ID NOs: 1-74.~~

~~4~~2. The antisense oligomer of claim 1 wherein the antisense oligomer contains one or more nucleotide positions subject to an alternative chemistry or modification chosen from the list comprising: (i) a modified backbone structure; (ii) modified sugar moieties; (iii) resistance to RNase H; (iv) oligomeric mimetic chemistry.

~~5~~3. The antisense oligomer of claim ~~1~~ 2 wherein the antisense oligomer is further modified by: (i) chemical conjugation to a moiety; and/or (ii) tagging with a cell penetrating peptide.

~~6~~4. The antisense oligomer of any one of claims 1 to 3, wherein the antisense oligomer is a phosphorodiamidate morpholino oligomer.

~~7~~5. The antisense oligomer of any one of claims 1 to 4, wherein when any uracil (U) is present in the nucleotide sequence, the uracil (U) is replaced by a thymine (T).

~~8~~6. The antisense oligomer of any one of claims 1 to 5 that operates to induce skipping of one or more of the exons of the CNOT3 gene transcript or part thereof.

~~9~~7. The antisense oligomer of any one of claims 1 to 5 that results in the expression of a PRPF31 protein between 1.5 and 5 fold higher than the expression of the PRPF31 protein in subjects with symptomatic PRPF31 mutations.

~~10~~8. A method for manipulating splicing in a CNOT3 gene transcript *ex vivo*, the method including the step of:

a) providing one or more of the antisense oligomers according to any one of claims 1 to ~~8~~ 7 and allowing the oligomer(s) to bind to a target nucleic acid site.

~~11~~9. A pharmaceutical, prophylactic, or therapeutic composition to treat, prevent or ameliorate the effects of a disease related to CNOT3 expression in a patient, the composition comprising:

a) one or more antisense oligomers according to any one of claims 1 to ~~8~~7, and

b) one or more pharmaceutically acceptable carriers and/or diluents.

~~12. A method to treat, prevent or ameliorate the effects of a disease associated with CNOT3 expression, comprising the step of:~~

~~a) administering to the patient an effective amount of one or more antisense oligomers or pharmaceutical composition comprising one or more antisense oligomers according to any one of claims 1 to 9.~~

~~13~~10. ~~The u~~Use of purified and isolated antisense oligomers according to any one of claims 1 to ~~9~~7, for the manufacture of a medicament to treat, prevent or ameliorate the effects of a disease associated with CNOT3 expression.

~~14~~11. A kit to treat, prevent or ameliorate the effects of a disease associated with CNOT3 expression in a patient, which kit comprises at least an antisense oligomer according to any one of claims 1 to ~~9~~ 7 and combinations or cocktails thereof, packaged in a suitable container, together with instructions for its use.

~~15~~12. The composition of claim ~~11~~9, method of claim ~~10~~ 8~~or 12~~, use of claim ~~13~~ 10 or kit of claim ~~14~~ 11, wherein the CNOT3 expression related disease is retinitis pigmentosa.

~~16~~13. The composition of claim ~~11~~9, method of claim ~~10~~ 8~~or 12~~, use of claim ~~13~~ 10 or kit of claim ~~14~~ 11, wherein the subject with the disease associated with CNOT3 expression is a human.

~~17~~14. The composition of claim ~~11~~9, method of claim ~~10~~ 8~~or 12~~, use of claim ~~13~~ 10 or kit of claim ~~14~~ 11 that results in the expression of a PRPF31 protein between 1.5 and 5 fold higher than the expression of the PRPF31 protein in subjects with symptomatic PRPF31 mutations.

~~18~~15. The antisense oligomer of any one of claims 1 to 7 selected from the list ~~comprising~~consisting of: SEQ ID NOs: 4, 7, 9, 11, 15~~, 16~~-18, 27, 30, 34, 35 and 64.

~~19~~16. ~~,~~ The antisense oligomer of claim ~~1~~ 16 selected from the list ~~comprising~~consisting of: SEQ ID NOs: 4, 7, 27, 30, 34 and 64.