CLAIMS

1. Use of a therapeutically effective amount of an agent in the manufacture of a medicament for treating a patient suffering from, or at risk of developing, amyloidosis

wherein the agent modulates expression or amount of BCL2-associated athanogene 3 (BAG3) encoding nucleic acid, BAG3 protein or BAG3 peptide thereby treating amyloidosis.

2. The use of claim 1, wherein the BAG3 encoding nucleic acid comprises an expression vector expressing a BAG3 protein or active fragment thereof.

3. The use of claim 2, wherein the expression vector further comprises a promoter, the promoter comprising an inducible promoter, a constitutive promoter, bicistronic promoter or tissue specific promoter.

4. The use of claim 2 or 3, wherein the expression vector comprises a viral vector, cardiotropic vector, plasmid, or a yeast vector.

5. The use of any of claims 1- 4, wherein a cardiotropic vector comprises an adenovirus vector, an adeno-associated virus vector (AAV), a coxsackie virus vector, cytomegalovirus vector, Epstein-Barr virus vector, parvovirus vector, or hepatitis virus vectors.

6. The use of claim 5, wherein the AAV vector comprises a capsid protein having 90% or more sequence identity to any of AAV1, AAV2, AAV3, AAV4, AAV5, AAV6, AAV7m AAV8, AAV9, AAV10, AAV11 or AAV12.

7. The use of claim 2 or 3, wherein the expression vector is a pseudotyped viral vector.

8. The use of any of claims 1-7, wherein the patient has or is at risk of having heart failure with preserved ejection fraction (HFpEF).

9. The use of any of claims 1-8, wherein the patient has or is at risk of having cardiac amyloid deposits or increased cardiac amyloid compared to age, gender and/or race matched control.

10. The use of any of claims 1-9, wherein the patient expresses lower than normal levels of BAB3 in cardiac tissue.

11. The use of any of claims 1-10, wherein the amyloidosis comprises cardiac amyloidosis or Alzheimer's disease.

12. The use of claim 11, wherein the patient does not have a mutation or defect in the transthyreitn (ATTAR) gene.

13. The use of any of claims 2-12, wherein the expression vector further comprises a promoter, the promoter optionally comprising an inducible promoter, a constitutive promoter, bicistronic promoter or tissue specific promoter.

14. The use of claim 13, wherein the inducible promoter confers expression in cardiac tissue or CNS.

15. The use of any of claims 2-14, wherein the expression vector further comprises an AAV inverted terminal repeat (ITR).

16. The use of any of claims 2-14, wherein the expression vector further comprises a polyadenylation sequence and/or stop codon.