Gene Therapy Market, 2015 - 2025

Description: Several disorders that arise inside the body are a result of either a direct genetic aberration or a dysfunctional/non-functional protein. The attempt to use nucleic acids to correct or delete the genes causing a particular disease is known as gene therapy. Although gene therapy has not contributed significantly to the global pharmaceutical market yet, it is anticipated to grow at a fast pace over the next decade.

Gendicine, developed by SiBiono GeneTech, was the foremost gene therapy that entered market in 2004 in China. Since then four more therapies have received approval in China, Philippines, Russia and the EU. This number for approved / marketed therapies seems weak at present; however, the strong and highly populated pipeline holds tremendous potential. There are 12 gene therapies in late stage of clinical development for the treatment of cancer, ocular and cardiovascular disorders.

There are several concerns that remain to be answered; examples include insertional mutagenesis, treatment of multigene disorders, curbing the risk of immune reactions, eugenics, high cost of therapy and ethical concerns related to making alterations at the genetic level. Despite this, gene therapy does offer a ray of hope for patients who either have no treatment options or show no benefits with drugs that are currently available. Such a benefit far outweighs any disadvantages that may be associated with this upcoming therapeutic field.

There is a lot of research underway for the first generation of controlled gene therapy, gene expression cassettes which deliver optimised gene expression and vectors which minimise the risk of immunogenicity. These research efforts have received strong support from various venture capital firms and institutional investors. With the expected launch of several new gene therapies in the US and EU, we expect the market to witness significant growth in the coming decade.

The "Gene Therapy Market, 2015-2025" report provides an extensive study on the marketed and pipeline gene therapies. A lot of research has been carried out in this field for over a decade but there are only five approved therapies (four available in Asian markets; one approved in the EU). There are many promising therapies which are currently being developed worldwide; the approach is likely to result in several commercial success stories in the foreseen future. The report covers various aspects, such as key players, marketed gene therapy products, products in clinical / pre-clinical research, associated ethical issues, likely future developments and upcoming opportunities for a variety of stakeholders.

As pharma companies continue to expand their research programs in this area, one of the key objectives outlined for this report is to understand the future potential of the market. This is done by analysing:

- The gene therapy pipeline in terms of phase of development, therapeutic area, target indications, types of vectors, gene types, etc.
- Interest of venture capital firms and recent funding rounds that have taken place in the gene therapy space.
- Development and sales potential based on target consumer segments, likely adoption rate and expected pricing.
- The constraints of gene therapy and future developments planned to overcome these.

The study provides an estimate of the short-midterm and long term market forecast for the period 2015 - 2025. The research, analysis and insights presented in this report include potential sales of the five approved gene therapies and 12 gene therapy products in late phases of development.

Owing to niche nature of the market, with most products in the pipeline, we have provided three market forecast scenarios to add robustness to our model. The conservative, base and optimistic scenarios represent three different tracks of industry evolution. All actual figures have been sourced and analysed from publicly available information and discussions with industry experts. The figures mentioned in this report are in USD, unless otherwise specified.

Contents: 1. Preface
1. Scope of the Report
1.2. Research Methodology
1.3. Chapter Outlines

2. Executive Summary

3. Introduction
3.1. Context and Background
3.2. Historical Evolution of Gene Therapy
3.3. Classification of Gene Therapy
3.3.1. Somatic vs. Germline
3.3.2. Ex-vivo vs. In-vivo
3.4. Route of Administration
3.5. How Does Gene Therapy Work?
3.6. Advantages and Disadvantages of Gene Therapy
3.7. Ethical and Social Concerns in Gene Therapy
3.7.1. Somatic Gene Therapy
3.7.2. Germ-line Gene Therapy
3.8. Future Constraints and Challenges
3.8.1 Manufacturing
3.8.2 Reimbursement
3.8.3 Commercial Viability

4. Viral and Non-Viral Vectors
4.1. Chapter Overview
4.2. Viral Methods of Gene Transfer
4.2.1. Retroviruses
4.2.2. Lentiviruses
4.2.3. Adenoviruses
4.2.4. Adeno Associated Virus
4.2.5. Herpes Simplex Virus
4.2.6. Alphavirus
4.2.7. Vaccinia Virus
4.2.8. Simian Virus
4.3. Non-Viral Vectors
4.3.1. Naked/Plasmid Vectors
4.3.2. Biolistic Method: Gene Gun
4.3.3. Electroporation
4.3.4. Receptor Mediated Gene Delivery Methods
4.3.5. Liposomes, Lipoplexes and Polyplexes
4.3.6. Gene Activated Matrix (GAM)

5. Pipeline of Gene Therapy
5.1. Chapter Overview
5.2. Gene Therapy: Pipeline Analysis
5.3. Oncology: The Most Popular Therapeutic Area
5.4. Distribution of Gene Therapies by Phase of Development
5.5. Distribution of Gene Therapies by Type of Vector
5.6. Distribution of Gene Therapies by Type of Genes Targeted
5.7. Distribution of Gene Therapies by Type of Sponsor

6. Marketed Gene Therapies and Applications
6.1. Chapter Overview
6.2. Gendicine (SiBionoGeneTech)
6.2.1. Company and Pipeline Overview
6.2.2. History of Approval
6.2.3. Mechanism of Action and Vectors Used
6.2.4. Target Indication
6.2.5. Development Status
6.2.6. Dosage, Sales and Manufacturing
6.2.7. Patent Portfolio
6.2.8. Gendicine Sales Forecast, 2015 - 2025
6.3. Oncorine (Shanghai Sunway Biotech)
6.3.1. Company and Pipeline Overview
6.3.2. History of Approval
6.3.3. Mechanism of Action and Vectors Used
6.3.4. Target Indication
6.3.5. Development Status
6.3.6. Dosage and Sales
6.3.7. Patent Portfolio
6.3.8. Oncorine Sales Forecast, 2015 - 2025
6.4. Rexin-G (Epeius Biotechnologies)
6.4.1. Company and Pipeline Overview
6.4.2. History of Approval
6.4.3. Mechanism of Action and Vector Used
6.4.4. Target Indication
6.4.5. Development Status
6.4.6. Dosage and Manufacturing
6.4.7. Patent Portfolio
6.4.8. Rexin-G Sales Forecast, 2015 - 2025
6.5. Neovasculgen (Human Stem Cell Institute)
6.5.1. Company and Pipeline Overview
6.5.2. History of Approval
6.5.3. Mechanism of Action and Vector Used
6.5.4. Target Indication
6.5.5. Development Status
6.5.6. Dosage, Sales and Manufacturing
6.5.7. Neovasculgen Sales Forecast, 2015 - 2025
6.6. Glybera (uniQure)
6.6.1. Company and Pipeline Overview
6.6.2. History of Approval
6.6.3. Target Indication
6.6.4. Technology
6.6.5. Development Status
6.6.6. Dosage and Manufacturing
6.6.7. Collaborations
6.6.8. Glybera Sales Forecast, 2015 - 2025

7. Gene Therapy: Pipeline Products
7.1. Chapter Overview
7.2. Generx (Taxus Cardium)
7.2.1. Company and Pipeline Overview
7.2.2. History of Development
7.2.3. Target Indication
7.2.4. Technology
7.2.5. Development Status
7.2.6. Dosage and Manufacturing
7.2.7. Collaborations
7.2.8. Generx Sales Forecast, 2015 - 2025
7.3. TK (MolMedS.p.A)
7.3.1. Company and Pipeline Overview
7.3.2. History of Development
7.3.3. Target Indication
7.3.4. Technology
7.3.5. Development Status
7.3.6. Dosage and Manufacturing
7.3.7. Collaborations
7.3.8. TK Sales Forecast, 2015 - 2025
7.4. Collategene (AnGes MG)
7.4.1. Company and Pipeline Overview
7.4.2. History of Development
7.4.3. Target Indication
7.4.4. Technology
7.4.5. Development Status
7.4.6. Dosage and Manufacturing
7.4.7. Collaborations
7.4.8. Collategene Sales Forecast, 2015 - 2025
7.5. TissueGene-C (TissueGene Inc./Kolon Life Sciences)
  7.5.1. Company and Pipeline Overview
  7.5.2. History of Development
  7.5.3. Target Indication
  7.5.4. Technology
  7.5.5. Development Status
  7.5.6. Dosage and Manufacturing
  7.5.7. Collaborations
  7.5.8. TissueGene-C Sales Forecast, 2015 - 2025
7.6. SPK-RPE65 (Spark Therapeutics)
  7.6.1. Company and Pipeline Overview
  7.6.2. History of Development
  7.6.3. Target Indication
  7.6.4. Technology
  7.6.5. Development Status
  7.6.6. Dosage and Manufacturing
  7.6.7. Collaborations
  7.6.8. SPK-RPE65 Sales Forecast, 2015 - 2025
7.7. Prostvac (Bavarian Nordic)
  7.7.1. Company and Pipeline Overview
  7.7.2. History of Development
  7.7.3. Target Indication
  7.7.4. Technology
  7.7.5. Development Status
  7.7.6. Dosage and Manufacturing
  7.7.7. Collaborations
  7.7.8. Prostvac Sales Forecast, 2015 - 2025
7.8. T-VEC (Amgen)
  7.8.1. Company and Pipeline Overview
  7.8.2. History of Development
  7.8.3. Target Indication
  7.8.4. Technology
  7.8.5. Development Status
  7.8.6. Dosage and Manufacturing
  7.8.7. Collaborations
  7.8.8. T-VEC Sales Forecast, 2015 - 2025
7.9. ProstAtak (Advantagene)
  7.9.1. Company and Pipeline Overview
  7.9.2. History of Development
  7.9.3. Target Indication
  7.9.4. Technology
  7.9.5. Development Status
  7.9.6. Dosage and Manufacturing
  7.9.7. Collaborations
  7.9.8. ProstAtak Sales Forecast, 2015 - 2025
7.10. TroVax (Oxford BioMedica)
  7.10.1. Company and Pipeline Overview
  7.10.2. History of Development
  7.10.3. Target Indication
  7.10.4. Technology
  7.10.5. Development Status
  7.10.6. Dosage and Manufacturing
  7.10.7. Collaborations
  7.10.8. TroVax Sales Forecast, 2015 - 2025
7.11. Algenpantucel-L (Newlink Genetics Corporation)
  7.11.1. Company and Pipeline Overview
  7.11.2. History of Development
  7.11.3. Target Indication
  7.11.4. Technology
  7.11.5. Development Status
  7.11.6. Dosage and Manufacturing
  7.11.7. Collaborations
7.11.8. Algenpantucel-L Sales Forecast, 2015 - 2025
7.12. ASP0113 (Vical/Astellas Pharma)
7.12.1. Company and Pipeline Overview
7.12.2. History of Development
7.12.3. Target Indication
7.12.4. Technology
7.12.5. Development Status
7.12.6. Dosage and Manufacturing
7.12.7. Collaborations
7.12.8. ASP0113 Sales Forecast, 2015 - 2025
7.13. E10A (Marsala Biotech)
7.13.1. Company and Pipeline Overview
7.13.2. History of Development
7.13.3. Target Indication
7.13.4. Technology
7.13.5. Development Status
7.13.6. Dosage and Manufacturing
7.13.7. Collaborations
7.13.8. E10A Sales Forecast, 2015 - 2025
7.14. Other Late Phase Gene Therapies
7.15. Overall Gene Therapy Market, 2015 - 2025

8. Promising Therapeutics Areas
8.1. Chapter Overview
8.2. Cancer
8.3. Neurological Disorders
8.3.1. Neurodegenerative Disorders
8.3.2. Lysosomal Storage Disorders (LSDs)
8.4. Ocular Diseases
8.5. Muscle Disorders
8.6. Blood Disorders (Anemia and Hemophilia)
8.7. Immunodeficiency Diseases

9. Gene Therapy: Additional Considerations
9.1. Chapter Overview
9.2. Venture Capital Investment in Gene Therapy
9.3. Conferences and Exhibitions on Gene Therapy
9.4. Contract Manufacturing in Gene Therapy

10. Conclusion
10.1. Move From Monogenic Diseases To Cancer
10.2. Controlled Gene Therapy for Optimised Gene Expression: Gradually Evolving
10.3. mRNA Mediated Gene Therapy: A Promising Approach to Improve Transfection Efficiency
10.4. Germline Gene Therapy: Potential yet to Unveil
10.5. A Strong Pipeline Likely To Result In A Multi-Billion Dollar Market

11. Interview Transcripts

12. Appendix 1: Tabulated Data

13. Appendix 2: List of Companies and Organisations

List of Tables:
Table 3.1 Differences between Ex vivo and In vivo Gene Therapy
Table 3.2 Price comparison of Marketed Gene Therapies
Table 3.3 Approved ATMPs in EU
Table 4.1 Features of Retrovirus
Table 4.2 Features of Lentivirus
Table 4.3 Features of Adenovirus
Table 4.4 Features of Adeno-associated Virus Vectors
Table 4.5 Features of Herpes Simplex Virus Vectors
Table 5.1 Pipeline: Approved/Marketed Gene Therapies
Table 5.2 Pipeline: Pre-registration/Phase III Gene Therapies
Table 5.3 Pipeline: Phase II/III Gene Therapies
Table 5.4 Pipeline: Phase II Gene Therapies
Table 5.5 Pipeline: Phase I/II Gene Therapies
Table 5.6 Pipeline: Phase I Gene Therapies
Table 5.7 Pipeline: Preclinical Stage
Table 5.8 Gene Therapy: University Spin-offs
Table 6.1 Marketed and Approved Gene Therapies
Table 6.2 Company Overview: SiBionoGeneTech
Table 6.3 Gendicine: Status of Development
Table 6.4 Gendicine: Patent Portfolio
Table 6.5 Company Overview: Shanghai Sunway Biotech
Table 6.6 H100 Series: Status of Development
Table 6.7 Company Overview: Epeius Biotechnologies
Table 6.8 Rexin-G: Status of Development
Table 6.9 Rexin G: Patent Portfolio
Table 6.10 Company Overview: Human Stem Cell Institute
Table 6.11 Neovascugen: Status of Development
Table 6.12 Company Overview: uniQure
Table 6.13 Glybera: Status of Development
Table 7.1 Gene Therapy: Late Stage Development Products
Table 7.2 Company Overview: Taxus Cardium
Table 7.3 Generx: Status of Development
Table 7.4 Company Overview: MolMedS.p.A.
Table 7.5 TK: Status of Development
Table 7.6 Company Overview: AnGes MG
Table 7.7 Collategene: Status of Development
Table 7.8 Company Overview: Kolon Life Science
Table 7.9 TissueGene-C: Status of Development
Table 7.10 Company Overview: Spark Therapeutics
Table 7.11 SPK-RPE65: Status of Development
Table 7.12 Company Overview: Bavarian Nordic
Table 7.13 Prostvac: Status of Development
Table 7.14 Company Overview: Amgen
Table 7.15 T-Vec: Status of Development
Table 7.16 Company Overview: Advantagene
Table 7.17 ProstAtak: Status of Development
Table 7.18 Company Overview: Oxford BioMedica
Table 7.19 TroVax: Status of Development
Table 7.20 Company Overview: NewLink Genetics
Table 7.21 Algenpantucel-L: Status of Development
Table 7.22 Company Overview: Vical
Table 7.23 ASP0113: Status of Development
Table 7.24 Company Overview: Marsala Biotech
Table 7.25 TissueGene-C: Status of Development
Table 7.26 Gene Therapies in Phase II/III
Table 7.27 Important Highlights of Gene Therapies in Phase II/III
Table 7.28 Gene Therapy: Expected Years of Launch
Table 8.1 Gene Therapy for Cancer
Table 8.2 Gene Therapy for Neurological Disorders
Table 8.3 Classification of Lysosomal Storage Disorders
Table 8.4 Gene Therapy for Lysosomal Storage Disorders
Table 8.5 Gene Therapy for Ocular Disorders
Table 8.6 Gene Therapy for Muscle Disorders
Table 8.7 Gene Therapy for Blood Disorders
Table 8.8 Gene Therapy for Immunodeficiency Diseases
Table 9.1 Recent Investments in Gene Therapy
Table 9.2 Gene Transfer: Conferences 2015
Table 9.3 Contract Manufactures in Gene Therapy
Table 12.1 Pipeline Analysis: Distribution by Therapeutic Area
Table 12.2 Pipeline Analysis: Distribution by Phase of Development
Table 12.3 Pipeline Analysis: Distribution by Type Gene Delivery Methods
Table 12.4 Pipeline Analysis: Distribution by the Gene Type
Table 12.5 Pipeline Analysis: Distribution by Drug Developer Type
Table 12.6 Gendicine: Sales Forecast 2015 - 2025, Base Scenario (USD Million)
Table 12.7 Gendicine: Sales Forecast 2015 - 2025, Conservative Scenario (USD Million)
Table 12.8 Gendicine: Sales Forecast 2015 - 2025, Optimistic Scenario (USD Million)
Table 12.9 Oncorine: Sales Forecast 2015 - 2025, Base Scenario (USD Million)
Table 12.10 Oncorine: Sales Forecast 2015 - 2025, Conservative Scenario (USD Million)
Table 12.11 Oncorine: Sales Forecast 2015 - 2025, Optimistic Scenario (USD Million)
Table 12.12 Rexin-G: Sales Forecast 2015 - 2025, Base Scenario (USD Million)
Table 12.13 Rexin-G: Sales Forecast 2015 - 2025, Conservative Scenario (USD Million)
Table 12.14 Rexin-G: Sales Forecast 2015 - 2025, Optimistic Scenario (USD Million)
Table 12.15 Human Stem Cell Institute: Revenues (RUB '000)
Table 12.16 Neovasculgen: Sales Forecast 2015 - 2025, Base Scenario (USD Million)
Table 12.17 Neovasculgen: Sales Forecast 2015 - 2025, Conservative Scenario (USD Million)
Table 12.18 Neovasculgen: Sales Forecast 2015 - 2025, Optimistic Scenario (USD Million)
Table 12.19 Glyceria: Sales Forecast 2015 - 2025, Base Scenario (USD Million)
Table 12.20 Glyceria: Sales Forecast 2015 - 2025, Conservative Scenario (USD Million)
Table 12.21 Glyceria: Sales Forecast 2015 - 2025, Optimistic Scenario (USD Million)
Table 12.22 Generx: Sales Forecast 2015 - 2025, Base Scenario (USD Million)
Table 12.23 Generx: Sales Forecast 2015 - 2025, Conservative Scenario (USD Million)
Table 12.24 Generx: Sales Forecast 2015 - 2025, Optimistic Scenario (USD Million)
Table 12.25 TK: Sales Forecast 2015 - 2025, Base Scenario (USD Million)
Table 12.26 TK: Sales Forecast 2015 - 2025, Conservative Scenario (USD Million)
Table 12.27 TK: Sales Forecast 2015 - 2025, Optimistic Scenario (USD Million)
Table 12.28 Collategene: Sales Forecast 2015 - 2025, Base Scenario (USD Million)
Table 12.29 Collategene: Sales Forecast 2015 - 2025, Conservative Scenario (USD Million)
Table 12.30 Collategene: Sales Forecast 2015 - 2025, Optimistic Scenario (USD Million)
Table 12.31 TissueGene-C: Sales Forecast 2015 - 2025, Base Scenario (USD Million)
Table 12.32 TissueGene-C: Sales Forecast 2015 - 2025, Conservative Scenario (USD Million)
Table 12.33 TissueGene-C: Sales Forecast 2015 - 2025, Optimistic Scenario (USD Million)
Table 12.34 SPK-RPE65: Sales Forecast 2015 - 2025, Base Scenario (USD Million)
Table 12.35 SPK-RPE65: Sales Forecast 2015 - 2025, Conservative Scenario (USD Million)
Table 12.36 SPK-RPE65: Sales Forecast 2015 - 2025, Optimistic Scenario (USD Million)
Table 12.37 Incidence and Mortality Rate 2012: Prostate Cancer
Table 12.38 Prostvac: Sales Forecast 2015 - 2025, Base Scenario (USD Million)
Table 12.39 Prostvac: Sales Forecast 2015 - 2025, Conservative Scenario (USD Million)
Table 12.40 Prostvac: Sales Forecast 2015 - 2025, Optimistic Scenario (USD Million)
Table 12.41 Incidence and Mortality Rate 2014: Melanoma
Table 12.42 Incidence and Mortality Rate 2012: Colorectal Cancer
Table 12.43 T-Vac: Sales Forecast 2015 - 2025, Base Scenario (USD Million)
Table 12.44 T-Vac: Sales Forecast 2015 - 2025, Conservative Scenario (USD Million)
Table 12.45 T-Vac: Sales Forecast 2015 - 2025, Optimistic Scenario (USD Million)
Table 12.46 Incidence and Mortality Rate 2012: Prostate Cancer
Table 12.47 ProstAtak: Sales Forecast 2015 - 2025, Base Scenario (USD Million)
Table 12.48 ProstAtak: Sales Forecast 2015 - 2025, Conservative Scenario (USD Million)
Table 12.49 ProstAtak: Sales Forecast 2015 - 2025, Optimistic Scenario (USD Million)
Table 12.50 Incidence and Mortality Rate 2012: Pancreatic Cancer
Table 12.51 TroVax: Sales Forecast 2015 - 2025, Base Scenario (USD Million)
Table 12.52 TroVax: Sales Forecast 2015 - 2025, Conservative Scenario (USD Million)
Table 12.53 TroVax: Sales Forecast 2015 - 2025, Optimistic Scenario (USD Million)
Table 12.54 Age-Standardised Rate 2012: Pancreatic Cancer
Table 12.55 Overall Gene Therapy Forecast 2015-2025: Base Scenario (USD Million)
Table 12.56 Overall Gene Therapy Forecast 2015-2025: Conservative Scenario (USD Million)
Table 12.57 Overall Gene Therapy Forecast 2015-2025: Optimistic Scenario (USD Million)
Table 12.58 Contribution of Oncology in Gene therapy market (USD Million)
Table 12.69 Number of Gene Therapies in Pre-clinical/Clinical Development for Cancer: By Disease Area
Table 12.70 Number of Gene Therapies in Pre-clinical/Clinical Development for Cancer: By Transfer Vectors
Table 12.71 Number of Gene Therapies in Pre-clinical/Clinical Development for Neurological Disorders: By Disease Area
Table 12.72 Number of Gene Therapies in Pre-clinical/Clinical Development for Neurological Disorders: By Transfer Vectors
Table 12.73 Number of Gene Therapies in Pre-clinical/Clinical Development for Lysosomal Storage Disorders: By Disease Area
Table 12.74 Number of Gene Therapies in Pre-clinical/Clinical Development for Lysosomal Storage Disorders: By Transfer Vectors
Table 12.75 Number of Gene Therapies in Pre-clinical/Clinical Development for Ocular Disorders: By Disease Area
Table 12.76 Number of Gene Therapies in Pre-clinical/Clinical Development for Ocular Disorders: By Transfer Vectors
Table 12.77 Number of Gene Therapies in Pre-clinical/Clinical Development for Muscle Disorders: By Disease Area
Table 12.78 Number of Gene Therapies in Pre-clinical/Clinical Development for Muscle Disorders: By Transfer Vectors
Table 12.79 Number of Gene Therapies in Pre-clinical/Clinical Development for Blood Disorders: By Disease Area
Table 12.80 Number of Gene Therapies in Pre-clinical/Clinical Development for Blood Disorders: By Transfer Vectors
Table 12.81 Number of Gene Therapies in Pre-clinical/Clinical Development for Immunodeficiency Diseases: By Disease Area
Table 12.82 Number of Gene Therapies in Pre-clinical/Clinical Development for Immunodeficiency Diseases: By Transfer Vectors
Table 12.83 Gene Therapy: Type of Investments in 2013 and 2014
Table 12.84 Gene Therapy: Investments made for different Body Systems
Table 12.85 Gene Therapy Conferences in 2015: Distribution by Month
Table 12.86 Contract Manufacturing in Gene Therapy: By Capability
Table 12.87 Contract Manufacturing in Gene Therapy: By Location
Table 12.88 Gene Therapy Market (USD Million), 2017, 2021 and 2025

List of Figures:
Figure 3.1 History of Evolution: Timeline
Figure 3.2 Gene Transfer using Viral Vectors
Figure 4.1 Gene Transfer: Viral and Non-Viral Methods
Figure 5.1 Pipeline Analysis: Distribution by Therapeutic Area
Figure 5.2 Pipeline Analysis: Distribution by Phase of Development
Figure 5.3 Pipeline Analysis: Distribution by Type of Vector
Figure 5.4 Pipeline Analysis: Distribution by Target Gene Type
Figure 5.5 Pipeline Analysis: Distribution by Drug Developer Type
Figure 6.1 Pipeline Overview: SiBionoGeneTech
Figure 6.2 Gendicine: Sales Forecast 2015 - 2025, Base Scenario (USD Million)
Figure 6.3 Pipeline Overview: Shanghai Sunway Biotech
Figure 6.4 Adenovirus Construct in Oncorine
Figure 6.5 Oncorine: Sales Forecast 2015 - 2025, Base Scenario (USD Million)
Figure 6.6 Pipeline Overview: Epeius Biotechnologies
Figure 6.7 Rexin-G: Sales Forecast 2015 - 2025, Base Scenario (USD Million)
Figure 6.8 Pipeline Overview: Human Stem Cell Institute
Figure 6.9 Human Stem Cell Institute: Revenues (RUB'000)
Figure 6.10 Neovascugen: Sales Forecast 2015 - 2025, Base Scenario (USD Million)
Figure 6.11 Pipeline Overview: uniQure
Figure 6.12 Glybera: Sales Forecast 2015 - 2025, Base Scenario (USD Million)
Figure 7.1 Pipeline Overview: TaxusCardium
Figure 7.2 Generx: Sales Forecast 2015 - 2025, Base Scenario (USD Million)
Figure 7.3 Pipeline Overview: MolMedS.p.A.
Figure 7.4 TK: Sales Forecast 2015 - 2025, Base Scenario (USD Million)
Figure 7.5 Pipeline Overview: AnGes
Figure 7.6 Collategene: Sales Forecast 2015 - 2025, Base Scenario (USD Million)
Figure 7.7 Pipeline Overview: Kolon Life Science
Figure 7.8 TissueGene-C: Sales Forecast 2015 - 2025, Base Scenario (USD Million)
Figure 7.9 Pipeline Overview: Spark Therapeutics
Figure 7.10 SPK-RPE65: Sales Forecast 2015 - 2025, Base Scenario (USD Million)
Figure 7.11 Pipeline Overview: Bavarian Nordic
Figure 7.12 Incidence and Mortality 2012: Prostate Cancer (in '000)
Figure 7.13 Prostvac: Sales Forecast 2015 - 2025, Base Scenario (USD Million)
Figure 7.14 Pipeline Overview: Amgen
Figure 7.15 Incidence and Mortality 2014: Melanoma (in '000)
Figure 7.16 Skin Cancer: Geographical Distribution of Death Rate (Cases per 100,000 People)
Figure 7.17 T-Vec: Sales Forecast 2015 - 2025, Base Scenario (USD Million)
Figure 7.18 Pipeline Overview: Advantagene
Figure 7.19 Incidence and Mortality 2012: Prostate Cancer (in '000)
Figure 7.20 ProstAtak: Sales Forecast 2015 - 2025, Base Scenario (USD Million)
Figure 7.21 Pipeline Overview: Oxford BioMedica
Figure 7.22 Incidence and Mortality 2012: Colorectal Cancer (in '000)
Figure 7.23 TroVax: Sales Forecast 2015 - 2025, Base Scenario (USD Million)
Figure 7.24 Pipeline Overview: NewLink Genetics
Figure 7.25 Age-Standardised Rate 2012: Pancreatic Cancer
Figure 7.26 Incidence and Mortality 2012: Pancreatic Cancer (in '000)
Figure 7.27 Algenpantucel-L: Sales Forecast 2015 - 2025, Base Scenario (USD Million)
Figure 7.28 Pipeline Overview: Vical
Figure 7.29 ASP0113: Sales Forecast 2015 - 2025, Base Scenario (USD Million)
Figure 7.30 Pipeline Overview: Marsala Biotech
Figure 7.31 E10A: Sales Forecast 2015 - 2025, Base Scenario (USD Million)
Figure 7.32 Overall Gene Therapy Market Outlook 2015-2025 (USD Million)
Figure 7.33 Contribution of Oncology to Gene Therapy Market
Figure 8.1 Number of Gene Therapies in Pre-clinical/Clinical Development for Cancer: By Disease Area
Figure 8.2 Number of Gene Therapies in Pre-clinical/Clinical Development for Cancer: By Transfer Vectors
Figure 8.3 Number of Gene Therapies in Pre-clinical/Clinical Development for Neurological Disorders: By Disease Area
Figure 8.4 Number of Gene Therapies in Pre-clinical/Clinical Development for Neurological Disorders: By Transfer Vectors
Figure 8.5 Number of Gene Therapies in Pre-clinical/Clinical Development for Lysosomal Storage Disorders: By Disease Area
Figure 8.6 Number of Gene Therapies in Pre-clinical/Clinical Development for Lysosomal Storage Disorders: By Transfer Vectors
Figure 8.7 Number of Gene Therapies in Pre-clinical/Clinical Development for Ocular Disorders: By Disease Area
Figure 8.8 Number of Gene Therapies in Pre-clinical/Clinical Development for Ocular Disorders: By Transfer Vectors
Figure 8.9 Number of Gene Therapies in Pre-clinical/Clinical Development for Muscle Disorders: By Disease Area
Figure 8.10 Number of Gene Therapies in Pre-clinical/Clinical Development for Muscle Disorders: By Transfer Vectors
Figure 8.11 Number of Gene Therapies in Pre-clinical/Clinical Development for Blood Disorders: By Disease Area
Figure 8.12 Number of Gene Therapies in Pre-clinical/Clinical Development for Blood Disorders: By Transfer Vectors
Figure 8.13 Number of Gene Therapies in Pre-clinical/Clinical Development for Immunodeficiency Diseases: By Disease Area
Figure 8.14 Number of Gene Therapies in Pre-clinical/Clinical Development for Immunodeficiency Diseases: By Transfer Vectors
Figure 9.1 Gene Therapy: Type of Investments in 2013 and 2014
Figure 9.2 Gene Therapy: Investments Made for Different Body Systems (USD Million)
Figure 9.3 Gene Therapy Conferences in 2015: Distribution by Month
Figure 9.4 Gene Transfer: Top Conference Sponsors
Figure 9.5 Contract Manufacturing in Gene Therapy: By Capability
Figure 9.6 Contract Manufacturing in Gene Therapy: By Location
Figure 10.1 Gene Therapy Market (USD Million), 2017, 2021 and 2025

Order by Fax - using the form below

Order by Post - print the order form below and send to

Research and Markets,
Guinness Centre,
Taylors Lane,
Dublin 8,
Ireland.
Fax Order Form
To place an order via fax simply print this form, fill in the information below and fax the completed form to 646-607-1907 (from USA) or +353-1-481-1716 (from Rest of World). If you have any questions please visit http://www.researchandmarkets.com/contact/

Order Information
Please verify that the product information is correct and select the format(s) you require.

Product Name: Gene Therapy Market, 2015 - 2025
Web Address: http://www.researchandmarkets.com/reports/3104738/
Office Code: SC

Product Formats
Please select the product formats and quantity you require:

<table>
<thead>
<tr>
<th>Product Format</th>
<th>Quantity</th>
<th>Price</th>
</tr>
</thead>
<tbody>
<tr>
<td>Electronic (PDF) - Single User</td>
<td>☐</td>
<td>USD 2199</td>
</tr>
<tr>
<td>Electronic (PDF) - Site License</td>
<td>☐</td>
<td>USD 4999</td>
</tr>
<tr>
<td>Electronic (PDF) - Enterprisewide</td>
<td>☐</td>
<td>USD 8999</td>
</tr>
</tbody>
</table>

* The price quoted above is only valid for 30 days. Please submit your order within that time frame to avail of this price as all prices are subject to change.

Contact Information
Please enter all the information below in BLOCK CAPITALS

Title:  Mr ☐  Mrs ☐  Dr ☐  Miss ☐  Ms ☐  Prof ☐  Last Name:  
First Name:  
Email Address: *  
Job Title:  
Organisation:  
Address:  
City:  
Postal / Zip Code:  
Country:  
Phone Number:  
Fax Number:  

* Please refrain from using free email accounts when ordering (e.g. Yahoo, Hotmail, AOL)
Payment Information

Please indicate the payment method you would like to use by selecting the appropriate box.

☐ Pay by credit card: You will receive an email with a link to a secure webpage to enter your credit card details.

☐ Pay by check: Please post the check, accompanied by this form, to:

Research and Markets,
Guinness Center,
Taylors Lane,
Dublin 8,
Ireland.

☐ Pay by Wire Transfer: Bank details will be provided on the invoice which you will receive after you place your order with us.

If you have a Marketing Code please enter it below:

Marketing Code: _______________________

Please note that by ordering from Research and Markets you are agreeing to our Terms and Conditions at http://www.researchandmarkets.com/info/terms.asp