

# **THE US COAGULATION MARKET, 2009-2018**

## **Table of Contents**

### **Worldwide Market and Technology Overview**

#### **A. Major Routine and Special Coagulation Tests**

1. Introduction
2. Activated Clotting Time (ACT)
3. Activated Protein C Resistance
4. Activated PTT (APTT)
5. Alpha-2 Antiplasmin
6. Antithrombin III
7. Bleeding Time
8. D-Dimer
9. Factor Assays
  - a. Introduction
  - b. Factor II
  - c. Factor V
  - d. Factor V Leiden
  - e. Factor VII
  - f. Factor VIII
  - g. Factor IX
  - h. Factor IXa
  - i. Factor X (Stuart Factor)
  - j. Factor Xa
  - k. Factor XI
  - l. Factor XII
  - m. Factor XIII
10. Fibrin Degradation Products
11. Fibrinogen
12. Fletcher Factor/Pre-Kallikrein Factor Activation
13. Heparin/Anti-Factor Xa
14. Heparin-Induced Thrombocytopenia
15. Plasmin
16. Plasminogen
17. Plasminogen Activator Inhibitor
18. Platelet Function/Aggregation
19. Protein C
20. Proteins S

## Table of Contents (continued)

21. Prothrombin Mutation
22. Prothrombin Time (PT)
23. Reptilase Time
24. Thrombin Time
25. Von Willebrand's Factor Fav/Ag

### **B. Instrumentation Review**

- Introduction
- Amelung/Sigma Amax CS190
- Amelung/Sigma Amax CS400
- Amelung/Sigma KC 40, 4A, 1A Series
- Benk Hemolab
- Benk TRT Thrombotimer
- Bio/Data MCA 310
- Bio/Data PAP-4C D/4D/4C
- Cardiovascular Diagnostics COAG
- Dade Behring BCS
- Dade Behring BCT
- Dade Behring BF II/Fibrintimer Series
- Diagnostica Stago STA-R
- Diagnostica Stago STA Compact
- Diagnostica Stago Star 4/8
- Helena THOR
- Helena Laboratories Cascade 480
- Helena Laboratories PACKS-4
- Helena Laboratories Cascade M
- Instrumentation Laboratory ACL9000
- Instrumentation Laboratory ACL7000
- Instrumentation Laboratory ACL6000
- Instrumentation Laboratory Futura
- Instrumentation Laboratory ACL 100 and 1000 series
- Instrumentation Laboratory Electra 1800C
- Instrumentation Laboratory Electra 1600/C
- Instrumentation Laboratory Electra 1400C
- Instrumentation Laboratory Electra 1000C
- ITC Hemochron 8000
- Organon Teknika Coag-A-Mate Max
- Organon Teknika MDA 180
- Organon Teknika Coag-A-Mate MTX

## **Table of Contents (continued)**

- Organon Teknika Coag-A-Mate XC/Plus
- Organon Teknika Coag-A-Mate RA4
- Organon Teknika Coag-A-Mate XM
- Roche Diagnostics CoaguChek
- Sysmex CA-1500
- Sysmex CA-7000
- Sysmex CA-6000
- Sysmex CA-500
- Sysmex CA-50
- Sysmex CA-5000/CA-1000
- Teco Coatron II/Jr./AccuStasis 5000

### **C. Major in Vitro Diagnostic Technologies and Their Potential Applications**

1. Chromogenic Substrates
2. Monoclonal and Polyclonal Antibodies
3. Immunoassays
  - a. Applications
  - b. Technological Principle
  - c. Enzyme Immunoassays (EIA)
    - Overview
    - ELISA
    - EMIT
    - Dot Immunobinding Assays
    - Capillary Immunoassays
    - Enzyme Amplification
    - Electrochemical Immunoassay
  - d. Fluorescent Immunoassays
    - Fluorescence Polarization
    - Time-Resolved Pulse Fluorescence
    - Fluorescence Lifetime
  - e. Latex Agglutination
  - f. Immunoprecipitation
4. Microcomputers
5. Automation
6. Robotics
7. DNA Probes
  - a. Overview
  - b. Amplification Methods

## Table of Contents (continued)

- PCR
- Ligase Chain Reaction
- Branched DNA
- Q-Beta Replicase
- NASBA
- SDA
- 3 SR
- HPA
- Two-Tiered System
- LAT

8. Artificial Intelligence

9. Dry Chemistry

10. Biosensors

### **D. Worldwide Market Overview**

1. Business Environment

2. Market Structure

3. Market Size and Growth

### **USA**

A. Executive Summary

B. Business Environment

1. Health Care Expenditures

2. Cost Consciousness

3. Reimbursement

4. Industry Consolidation

5. Managed Care

a. HMO

b. PPO

6. Hospitals

7. Admissions

8. Length of Stay

9. Industry Diversification

10. Physician Demographics

11. Population Aging

a. Chronic Illnesses

b. Disease Incidence

c. Susceptibility to Iatrogenesis

d. Multiple Illness Cases

12. Laboratory Regulations

## **Table of Contents (continued)**

- C. Market Structure
  - 1. Centralized Testing
    - a. Hospitals
    - b. Commercial laboratories
  - 2. Decentralized Testing
    - a. Physician Offices/Group Practices
    - b. Point-of-Care Testing
    - c. Home/Self Testing
    - d. Other Decentralized Testing Locations
- D. Market Size, Growth And Major Suppliers

### **Major Product Development Opportunities**

#### **Design Criteria For Decentralized Testing Products**

#### **Alternative Market Penetration Strategies**

- A. Internal Development
- B. Collaborative Arrangements
- C. University Contracts
- D. Distribution Strategies for Decentralized Testing Markets
  - 1. Marketing Approaches
  - 2. Product Complexity
  - 3. Customer Preference
  - 4. Established Suppliers
  - 5. Emerging Suppliers
  - 6. Major Types Of Distributors
  - 7. Market Segmentation

#### **Potential Market Entry Barriers And Risks**

- A. Market Maturity
- B. Cost Containment
- C. Competition
- D. Technological Edge And Limitations
- E. Patent Protection
- F. Regulatory Constraints
- G. Decentralized Testing Market Challenges

## **Table of Contents (continued)**

### **Competitive Assessments**

- Abbott
- Agen Biomedical
- American Diagnostica
- American Labor
- Axis-Shield
- Beckman Coulter
- Becton Dickinson
- Biosite
- Chronolog
- Corgenix Medical
- Diagen
- Diagnostica Stago
- Helena Laboratories
- HemoSense/Inverness Medical Innovations
- HYPEN BioMed
- Instrumentation Laboratory
- ITC
- Medafor
- Nanogen
- Roche
- Sarstedt
- Siemens
- Sienco
- Sysmex
- Thermo Fischer
- Trinity Biotech
- ZyCare

### **Appendixes**

- Appendix I: Major Companies Developing or Marketing Coagulation Analyzers
- Appendix II: Major Companies Developing or Marketing Coagulation Calibrators and Controls
- Appendix III: Major Companies Developing or Marketing Platelet Aggregometers
- Appendix IV: Assumed Currency Exchange Rates

## **THE US COAGULATION MARKET, 2009-2018**

### **List of Tables**

Major Companies Developing or Marketing Activated Clotting Time Tests

Major Companies Developing or Marketing APTT Tests

Major Companies Developing or Marketing Alpha-2 Antiplasmin Tests

Major Companies Developing or Marketing Antithrombin III Tests

Major Companies Developing or Marketing Bleeding Time Tests

Major Companies Developing or Marketing D-dimer Tests

Major Companies Developing or Marketing Factor Assays

Major Companies Developing or Marketing Fibrin Degradation Product Tests

Major Companies Developing or Marketing Fibrinogen Tests

Major Companies Developing or Marketing Heparin Tests

Major Companies Developing or Marketing Plasmin Tests

Major Companies Developing or Marketing Plasminogen Tests

Major Companies Developing or Marketing Plasminogen Activator Inhibitor Tests

Major Companies Developing or Marketing Platelet Aggregation Tests

Major Companies Developing or Marketing Protein C Tests

Major Companies Developing or Marketing Protein S Tests

## **List of Tables (continued)**

Major Companies Developing or Marketing PT Tests

Major Companies Developing or Marketing Thrombin Time Tests

Major Companies Developing or Marketing TPA Tests

Major Companies Developing or Marketing Von Willebrand's  
Factor Tests

Worldwide, All Market Segments, Laboratories Performing  
Coagulation Tests By Country, 2008

Worldwide, All Market Segments, Total Coagulation Test Volume  
By Country, 2008-2018

Worldwide, All Market Segments, Total Coagulation Reagent  
Market By Country, 2008-2018

Worldwide, All Market Segments, Total Coagulation Instrument  
Market By Country, 2008-2018

Worldwide, All Market Segments, Total Coagulation Diagnostics  
Market By Country, 2008-2018

Executive Summary Table: U.S.A., Total Coagulation Diagnostics  
Market By Market Segment and Product Category, 2008-2018

U.S.A., Laboratories Performing Coagulation Tests By Market  
Segment, 2008

U.S.A., Hospital Laboratories Performing Coagulation Tests By  
Bed Size, 2008

U.S.A., Commercial/Private Laboratories Performing Coagulation  
Tests By Annual Test Volume, 2008

U.S.A., Physician Offices/Group Practices Performing Coagulation  
Tests By Practice Size, 2008

**List of Tables (continued)**

U.S.A., Hospital Laboratories Average Daily Test Volume, 2008

U.S.A., Commercial/Private Laboratories Average Daily Test Volume, 2008

U.S.A., Physician Offices/Group Practices Average Daily Test Volume

U.S.A., Total Coagulation Test Volume By Market Segment, 2008-2018

U.S.A., All Market Segments Coagulation Test Volume, 2008-2018

U.S.A., Hospital Laboratories Coagulation Test Volume, 2008-2018

U.S.A., Physician Offices/Group Practices Coagulation Test Volume, 2008-2018

U.S.A., Commercial/Private Laboratories Coagulation Test Volume, 2008-2018

U.S.A., Coagulation Reagent Market By Market Segment, 2008-2018

U.S.A., Major Suppliers of Coagulation Reagents Estimated Sales and Market Shares, 2008

U.S.A., Coagulation Instrument Market By Market Segment, 2008-2018

U.S.A., Major Suppliers of Coagulation Analyzers, Estimated Total Instrument Placements and Market Shares, 2008

U.S.A., Major Suppliers of Coagulation Analyzers, Estimated Placements and Installed Base By Supplier and Model, 2008

**List of Tables (continued)**

U.S.A., Major Suppliers of Coagulation Analyzers, Estimated Instrument Sales and Market Shares, 2008

U.S.A., Total Coagulation Diagnostics Market By Product Category, 2008-2018

U.S.A., Major Suppliers of Coagulation Diagnostic Products, Estimated Sales and Market Shares, 2008