

CytoSorbents™



CytoSorbents Corporation Second Quarter 2021 Earnings Conference Call August 3, 2021

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WORKING TO SAVE LIVES

Conference Call Participants

Moderator: Terri Anne Powers
CytoSorbents Corporation



Phillip Chan, MD, PhD – Chief Executive Officer



Vincent Capponi, MS – Chief Operating Officer and President



Kathleen Bloch, MBA, CPA – Chief Financial Officer



Efthymios "Makis" Deliargyris, MD, FACC, FESC, FSCAI – Chief Medical Officer



Christian Steiner, MD – Executive Vice President of Sales and Marketing
Managing Director – CytoSorbents Europe GmbH



Christopher Cramer, MS, MBA – Vice President of Business Development

Safe Harbor Statement

Statements in this presentation regarding CytoSorbents Corporation and its operating subsidiaries CytoSorbents Medical, Inc and CytoSorbents Europe GmbH that are not historical facts are forward-looking statements and are subject to risks and uncertainties that could cause actual future events or results to differ materially from such statements. Any such forward-looking statements are made pursuant to the safe harbor provisions of the Private Securities Litigation Reform Act of 1995. It is routine for our internal projections and expectations to change. Although these expectations may change, we are under no obligation to inform you if they do. Actual events or results may differ materially from those contained in the projections or forward-looking statements. The following factors, among others, could cause our actual results to differ materially from those described in a forward-looking statement: our history of losses; potential fluctuations in our quarterly and annual results; competition, inability to achieve regulatory approval for our device, technology systems beyond our control and technology-related defects that could affect the companies' products or reputation; risks related to adverse business conditions; our dependence on key employees; competition for qualified personnel; the possible unavailability of financing as and if needed; and risks related to protecting our intellectual property rights or potential infringement of the intellectual property rights of third parties. This list is intended to identify only certain of the principal factors that could cause actual results to differ from those discussed in the forward-looking statements. Readers are referred to a discussion of important risk factors detailed in the Company's Form 10-K filed with the Securities and Exchange Commission on March 9, 2021, and other reports and documents filed from time to time by us, which are available online at www.sec.gov.

Q2 2021 Operational Update

Phillip Chan, MD, PhD
Chief Executive Officer

Q2 2021 Operational Highlights

- Received Full FDA IDE approval to begin U.S. STAR-T trial with the DrugSorb-ATR antithrombotic removal system, with first patients targeted for Q3 2021 and study completion expected in 2022
- Delivered >143,000 cumulative CytoSorb cartridges to date, up 43% from 100,000 a year ago with distribution across 68 countries
- Treated >6,500 COVID-19 patients in >30 countries, including here in the U.S. under FDA Emergency Use Authorization, granted in April 2020
- CytoSorb was registered and became commercially available in Singapore for all equivalent European Union indications, bringing the total number of countries where CytoSorb is distributed to 68
- Appointed Terri Anne Powers, MBA, IRC as Vice President, Investor Relations and Corporate Communications
- Successfully completed the MISSION 100,000 international fundraising campaign to raise \$100,000 for the global humanitarian organization, CARE, to fight the spread of COVID-19, matching the generous donations of our business partners, friends, employees, and shareholders

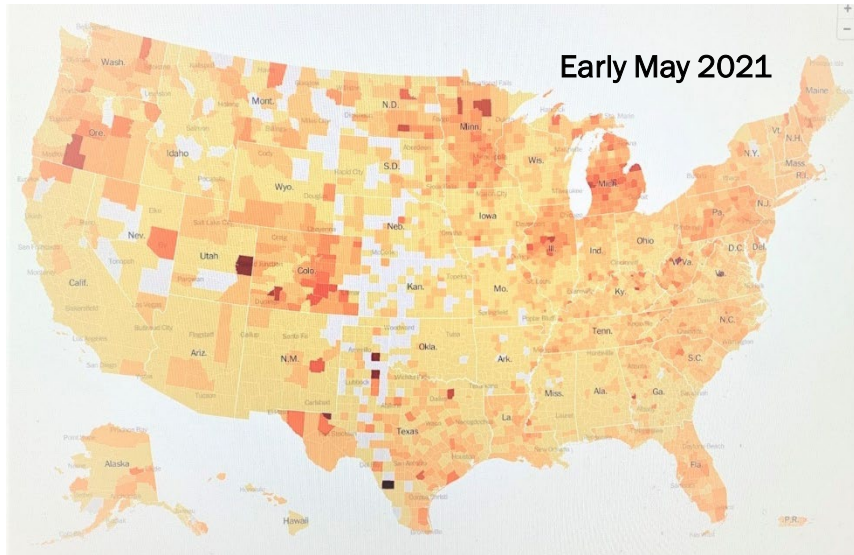


Q2 2021 Financial Highlights

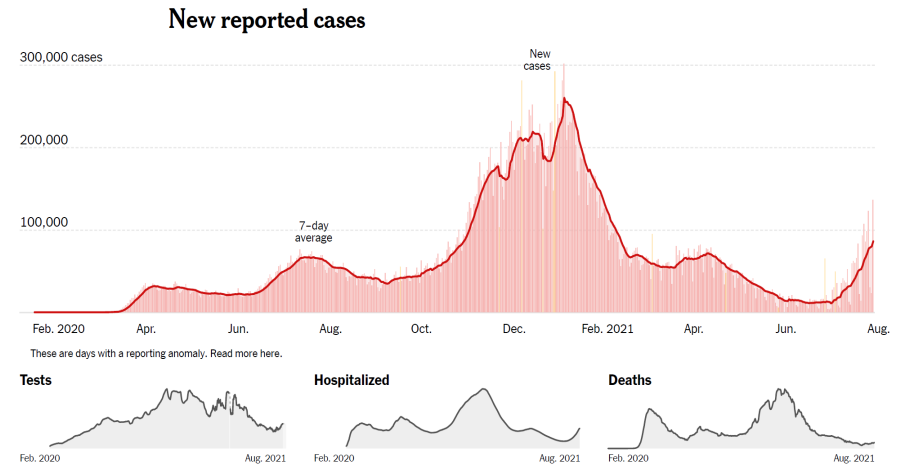
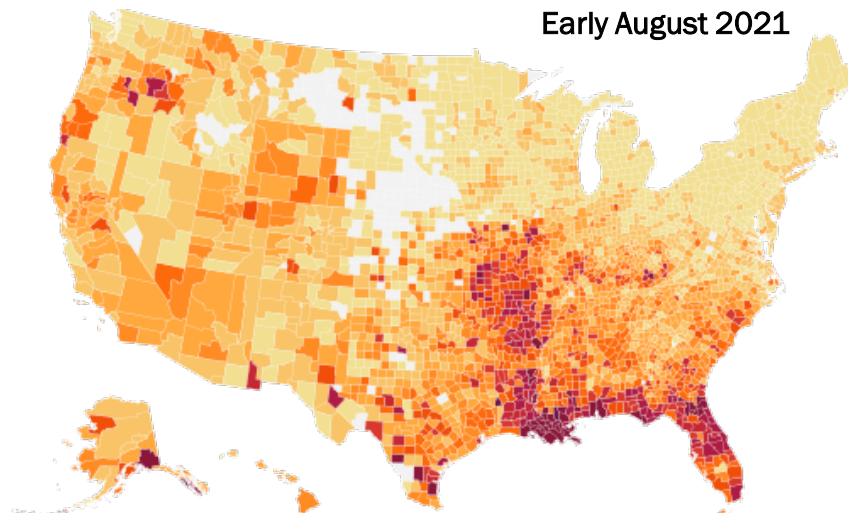
- Total Q2 2021 revenue of \$12.0M vs. \$9.8M in Q2 2020
- Q2 2021 product sales of \$11.4M vs. \$9.5M a year ago, a 19% increase
- Core, non-COVID-19 sales in Q2 2021 grew **38% Y-Y** and accounted for 85% of product sales
- Blended product gross margins were **82%** in Q2 2021 vs. 70% for Q2 2020
- Solid balance sheet with **\$65.6M** in cash (6/30/21) and no long-term debt



U.S. COVID-19 Status



- Rapidly rising new cases in Southern Central/East states. West coast worsening
- 97% of new serious infections are in unvaccinated
- Highly contagious Delta variant responsible for 83% of new U.S. infections



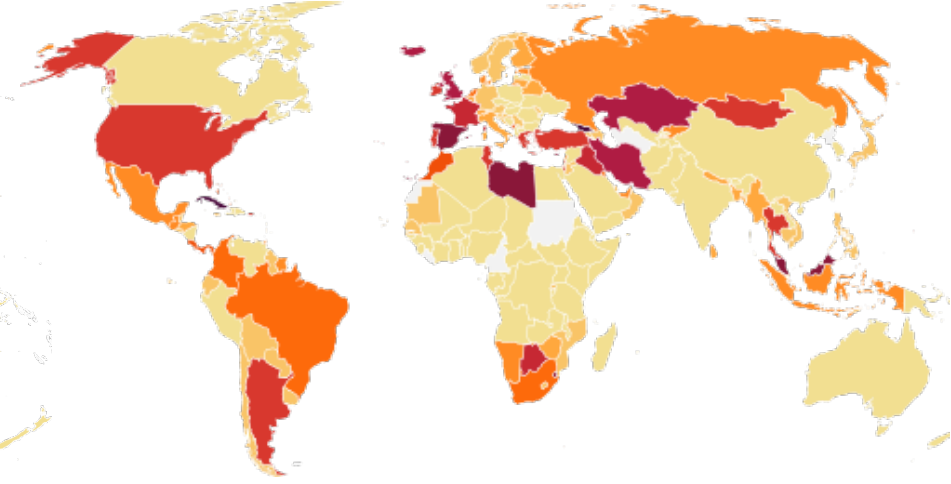
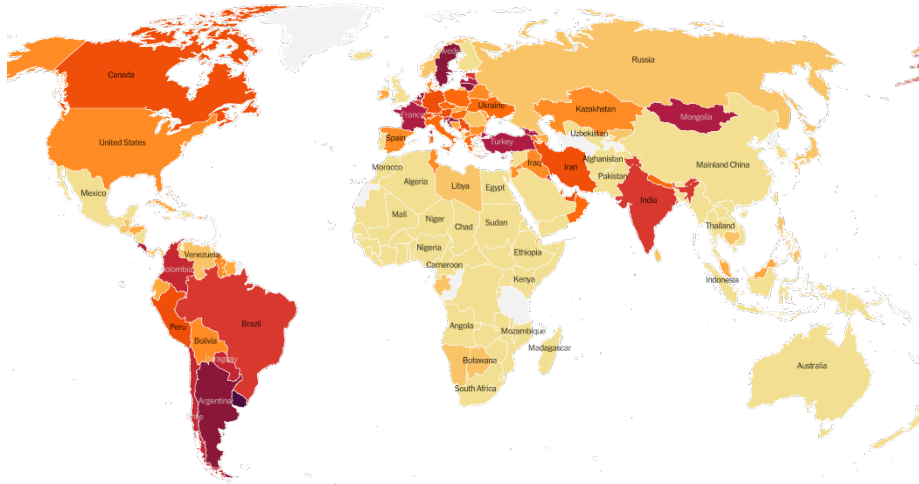
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Worldwide COVID-19 Status

Early May 2021

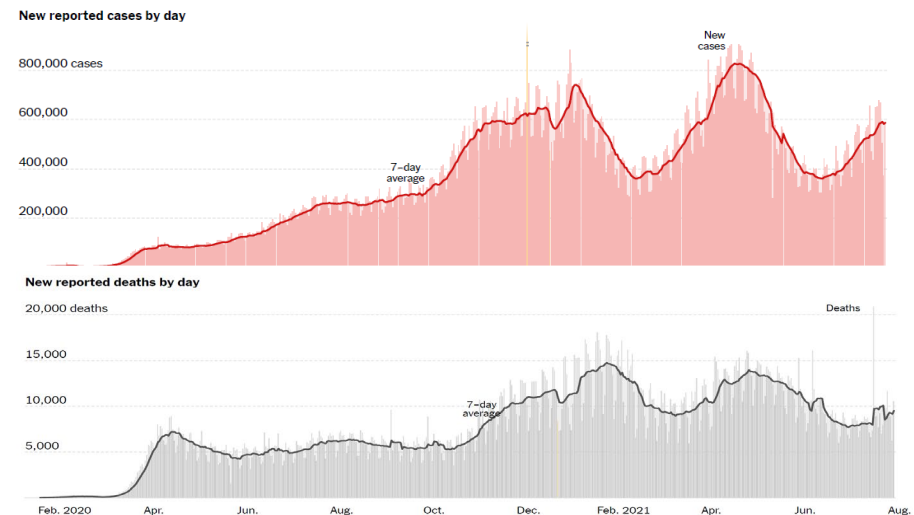
Early August 2021



COVID-19 continues to cycle through countries, driven by new variants (e.g. Delta) and unvaccinated people

New surges in U.K., Spain, Portugal, France, Russia, Middle East, SE Asia, South Africa

Country	Fully Vaccinated	Partially Vaccinated
U.S.	49%	57%
Germany	50%	61%
Italy	49%	62%
France	46%	60%
Spain	55%	65%
Worldwide	14%	28%



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2021 Product Revenue Guidance

- We expect second half 2021 product revenue to be greater than product revenue in the first half of 2021
- We expect continued strong growth in core underlying non-COVID-19 sales, with at least 30% Y-Y growth in the second half of 2021, as well as at least 30% Y-Y growth in full year core underlying non-COVID-19 product sales
- Due to uncertainty regarding the course of the COVID-19 pandemic, including vaccination rates and virus variant trends, we are unable to predict the level of COVID-19 sales in the second half of 2021. To be conservative, we expect COVID-19 related sales to be less than \$1M in the second half of 2021

Investing in Key Areas to Drive Growth

Company Sponsored Clinical Studies

210+ Headcount – Sales Marketing, Manufacturing

Buildout of New Manufacturing Facility

Strengthen Logistics with New Hub

2021	
Cardiovascular	STAR-T RCT
	REFRESH II RCT
	CYTATION Single Arm
	STAR Registry
Critical Care	PROCYSS RCT
	Hep-On-Fire Single Arm
	CTC Registry



R&D for New Products & Applications

Retired Debt
↑ Inventory

Int'l Expansion & Prep for U.S. Commercialization

 Sepsis, Critical Care, High Risk Surgery CE Ex Vivo Organ Perfusion For Transplant CE Critical Illnesses in Animals Marketed	 Removal of Antithrombotics HemoDefend RBC Purification of pRBCs HemoDefend BGA Universal Plasma CytoSorb-KL Successor to CytoSorb K-control Severe Hyperkalemia ContrastSorb CT Imaging and Interventional Radiology Under Development
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Clinical Update

Prioritizing US Marketing Approval and Executing Global Clinical Strategy

Efthymios N. Deliargyris, MD, FACC, FESC, FSCAI
Chief Medical Officer

Dual Path to FDA Marketing Approval

STUDY	Status
<p><i>Ticagrelor Removal</i></p> <p>STAR-T</p> <p>TOP PRIORITY</p> 	<ul style="list-style-type: none">• Full FDA IDE approval to study DrugSorb-ATR received 7/2/2021• Double blind, RCT to enroll 120 patients at 20 US sites• STAR-T study listed on clinicaltrials.gov (NCT04976530)• Renowned study leadership (PIs: Michael Mack & Mike Gibson)• Very high degree of enthusiasm by U.S. institutions for participation in STAR-T with all target sites already identified• Site contracting and IRB submissions/approvals in progress• First investigator meeting successfully held July 14, 2021• Site activations (SIVs) have begun - FPI on target for Q3 2021• STAR-T methods manuscript submitted for publication• Targeted STAR-T study completion: 2022
<p><i>Post-operative AKI</i></p> <p>REFRESH-2</p>	<ul style="list-style-type: none">• Study resumption in Q2 – majority of sites already active & enrolling - Remaining sites active by year-end• Next milestone: Interim Analysis (est. 2H 2022)

We believe STAR-T represents the lowest risk and fastest path to FDA marketing approval and sets precedent for future trials to expand Antithrombotic Removal opportunity beyond ticagrelor

2021- Rich in Clinical Milestones

Complementary approach to data generation: RCTs, Registries, Single-arm trials

2021		Q1	Q2	Q3	Q4
Cardiovascular	STAR-T RCT	Protocol	IDE Submission & Full FDA Approval	Operational Readiness	FPI Enrollment
	REFRESH II RCT	Protocol	Study Resumption Activities	FPI	Enrollment
	CYTATION Single Arm	Operational Readiness	FPI	Enrollment	
	STAR Registry	Protocol	EC Submission Operational Readiness	FPI	Enrollment
Critical Care	PROCYSS RCT	Protocol	EC Approval Operational Readiness	FPI	Enrollment
	Hep-On-Fire Single Arm	Protocol		EC Submission Operational Readiness	FPI
	CTC Registry	CTC Enrollment		Publication submission	Topline Results Presentation/Publication

All clinical programs have either achieved or on track to hit 2021 milestones

Q2 2021 Financial Highlights

Kathleen Bloch, MBA, CPA
Chief Financial Officer

Q2 2021 Comparative Revenue Results

	Quarter Ended June 30, 2021	Quarter Ended June 30, 2020	Y-Y % Increase
Product revenue	\$11.4M	\$9.5M	19%
Grant income	\$0.6M	\$0.3M	140%
Total revenue	\$ 12.0M	\$ 9.8M	23%

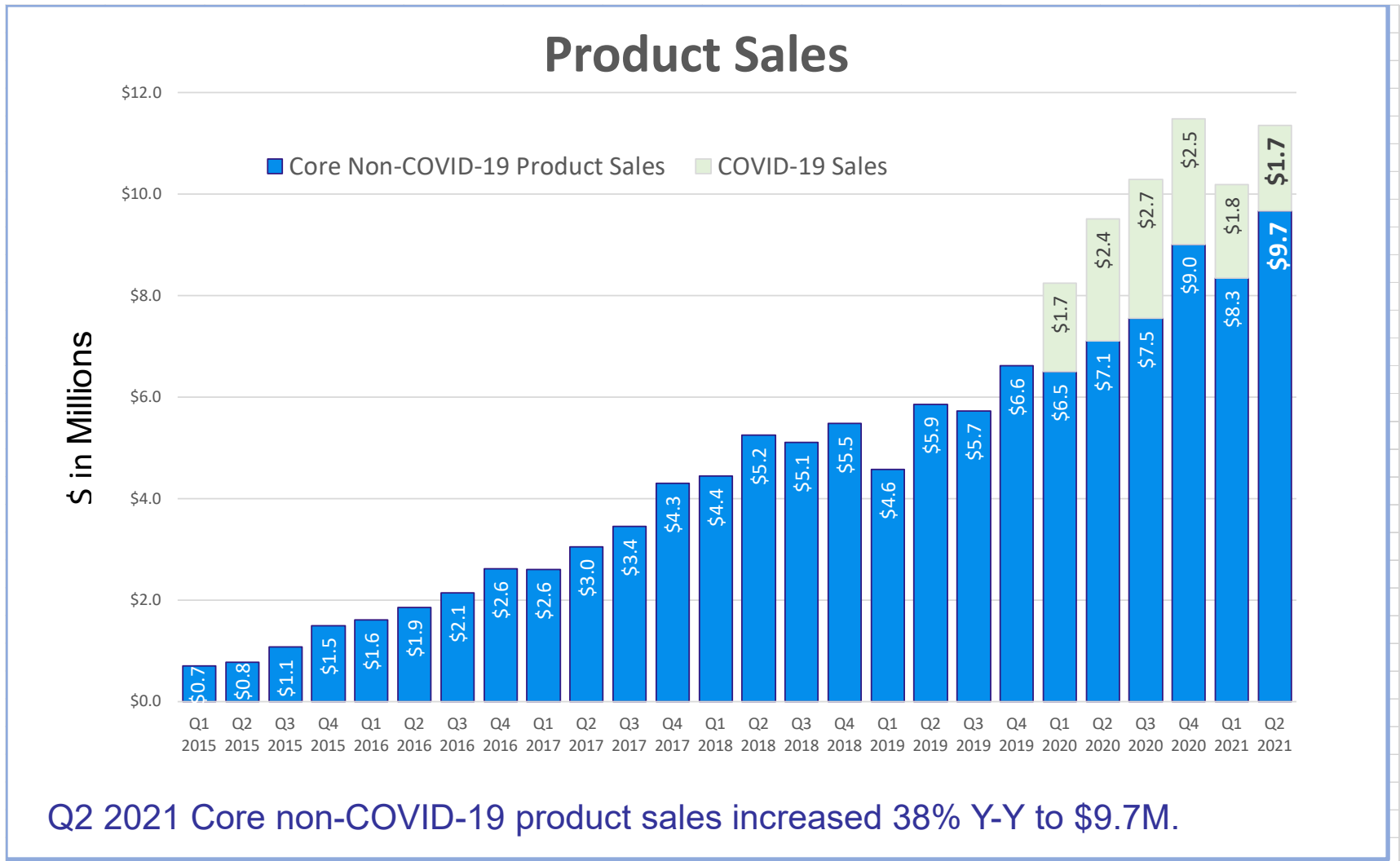
- Q2 2021 product sales were \$11.4M, a 19% increase over \$9.5M in Q2 2020, driven by growth in core non-COVID-19 sales of 38%
- Q2 2021 grant revenues of \$659K, a return to normal grant activity
- Total revenue, which includes both product sales and grant revenue, increased 23% to \$12.0M in Q2 2021, compared to \$9.8M in Q2 2020
- Q2 2021 gross profit was \$9.3M, an increase of approximately \$2.8M, or 42%, from \$6.5M for Q2 2020
- Q2 2021 product gross margins were 82%, compared to 70% for Q2 2020

Comparative First Half Revenue Results

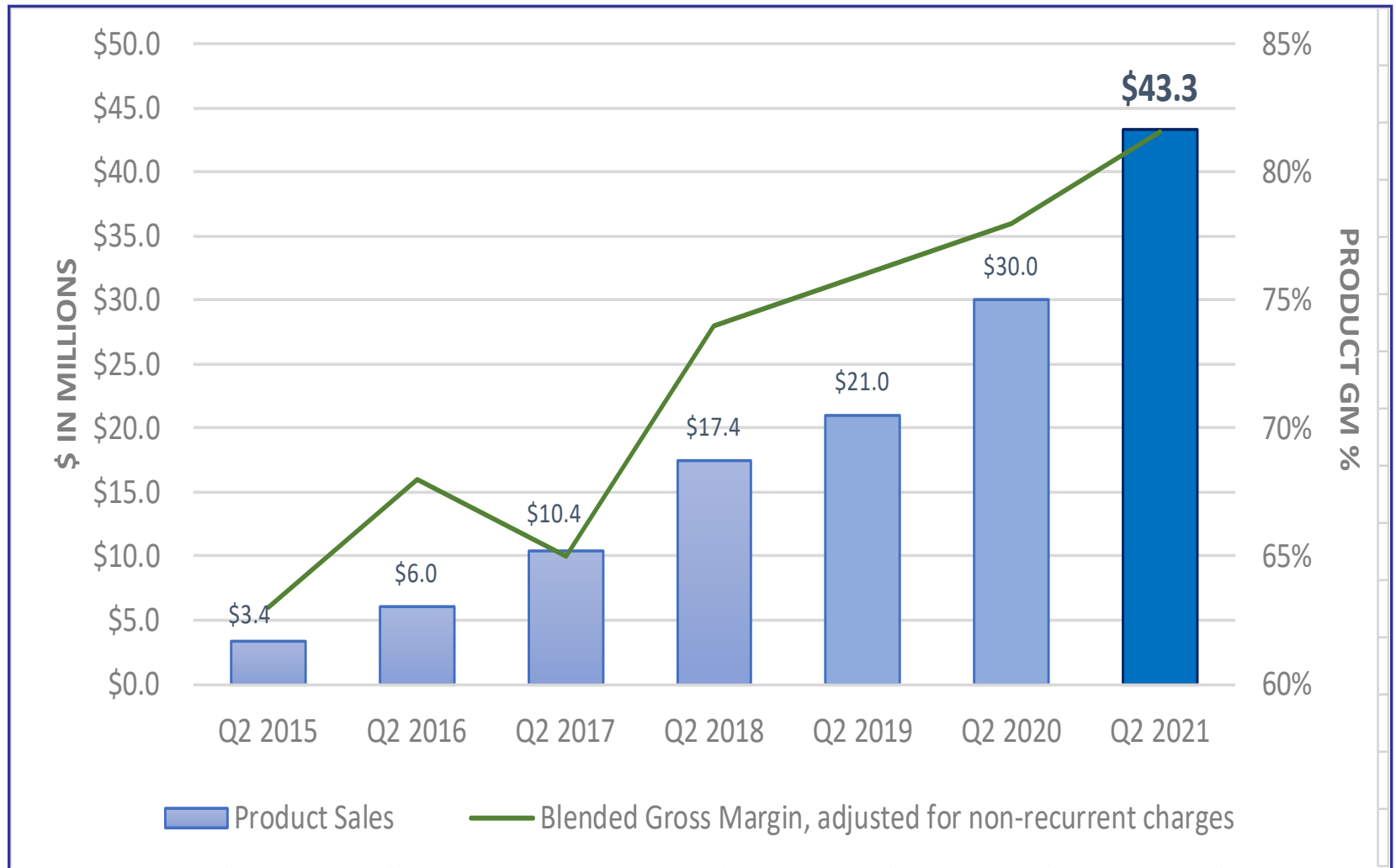
	First Half Ended June 30, 2021	First Half Ended June 30, 2020	Y-Y % Increase
Product revenue	\$21.5M	\$17.7M	22%
Grant income	\$1.1M	\$0.8M	35%
Total revenue	\$22.6M	\$18.5M	22%

- Product sales for 1H 2021 were \$21.5M, a 22% increase over product sales of \$17.7M for the same period a year ago
- Grant revenue was \$1.1M for the first half of 2021, compared to \$826K in the first half of 2020
- Total revenue for 1H 2021, which includes both product sales and grant revenue, was \$22.6M compared to \$18.5M for 1H 2020, an increase of 22%

Quarterly Product Sales



Trailing Twelve Month Product Sales



Working Capital and Cap Table (\$M)

Working Capital as of					
	6/30/2021	3/31/2021	12/31/2020	12/31/2019	12/31/2018
Current Assets:					
Cash and short-term investments	\$65.6	\$68.5	\$71.4	\$12.2	\$22.4
Grants and accounts receivable, net	5.8	5.0	5.2	4.5	3.9
Inventories	3.7	3.1	2.7	2.1	0.8
Prepaid expenses and other current assets	2.0	3.0	3	2.1	1.1
Total current assets	77.1	79.6	82.5	20.9	28.2
Current Liabilities:					
Accounts payable	2.2	1.7	1.8	2.0	1.5
Accrued expenses and other current liabilities	8.4	7.6	7.9	5.8	4.4
Current maturities of long-term debt	-	-	-	1.7	0.6
Lease liability - current portion	0.3	0.5	0.4	0.4	-
Deferred revenue	-	-	-	-	-
Total current liabilities	10.8	9.8	10.2	9.9	6.5
Net Working Capital	\$ 66.3	\$ 69.9	\$ 72.3	\$ 11.0	\$ 21.7

Cap Table 6/30/2021

	Fully Diluted Common Shares
Common Stock	43,337,905
Options	6,859,939
Restricted Stock Unit Awards	344,247
Total	50,542,091

Commercialization Update

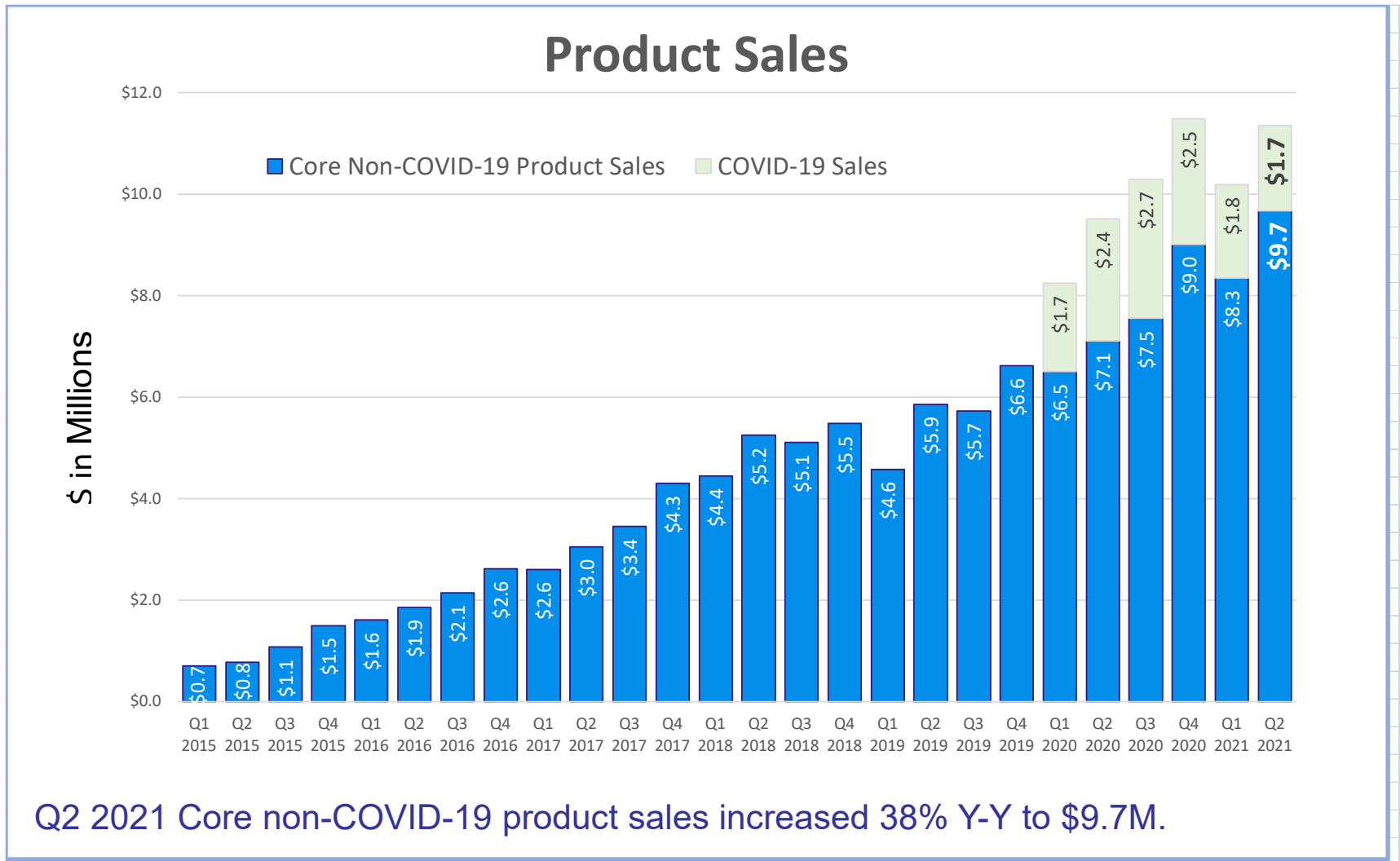
Growing the Core Business

Christian Steiner, MD

Executive Vice President of Sales and Marketing

Managing Director – CytoSorbents Europe GmbH

Quarterly Product Sales



COVID Situation Improving

COVID-related challenges are declining:

- Access to hospitals and doctors significantly improved
 - Appointment frequency – Q1: <25%; Q2: <50%; Q3: 50-75% vs. pre-pandemic
 - High interest for CytoSorb news and information
 - Increased interest in study/registry participation
 - Acquisition of new customers and reestablishment of business with pre-pandemic customers
- Elective surgery programs re-starting
 - Cardiac Surgery (75% of Cardiac Surgery centers on the way to normal)
 - Long waiting lists – surgery programs strive to increase capacity over 100% to compensate
 - Other surgery specialties increasing too, but still compromised
- Fewer reserved ICU beds for COVID patients
- Patients more comfortable going to hospitals and planning surgical procedures

Strong Core Sales Growth Expected to Continue

- Core business delivered record Q2 sales with 38% Y-Y growth despite pandemic restrictions
- Indications include
 - **Critical Care indications** with high cytokine blood levels including septic and non-infectious vasoplegic shock
 - **Cardiovascular indications:** antithrombotic drug removal (Ticagrelor, Rivaroxaban) during cardiothoracic surgery
 - **Liver Support Therapy** when there are high bilirubin blood levels
 - **Trauma:** when there are high myoglobin levels
- Core, non-COVID-19, sales expected to grow at least 30% Y-Y in the both the second half and full year 2021

Well-Positioned for Sustained, Long-Term Growth

- Strong, experienced management team with continued addition of key talent to support growth initiatives
- Well-capitalized to support planned investments in manufacturing capacity, clinical programs and commercialization efforts for the coming years
- Continued growth expected in ex-US markets driven by geographic expansion, label additions and potential additional partnerships
- Targeted dual-path to U.S. FDA marketing approval, several clinical milestones expected in 2021
 - Focus on removal of ticagrelor during cardiothoracic surgery as initial targeted indication
- Continued development of other product lines utilizing CytoSorbents' proprietary polymer technology platform
- Operational excellence to support improved efficiency and profitability
- Goal to reach GAAP operating cash flow profitability in two years

Q&A Session

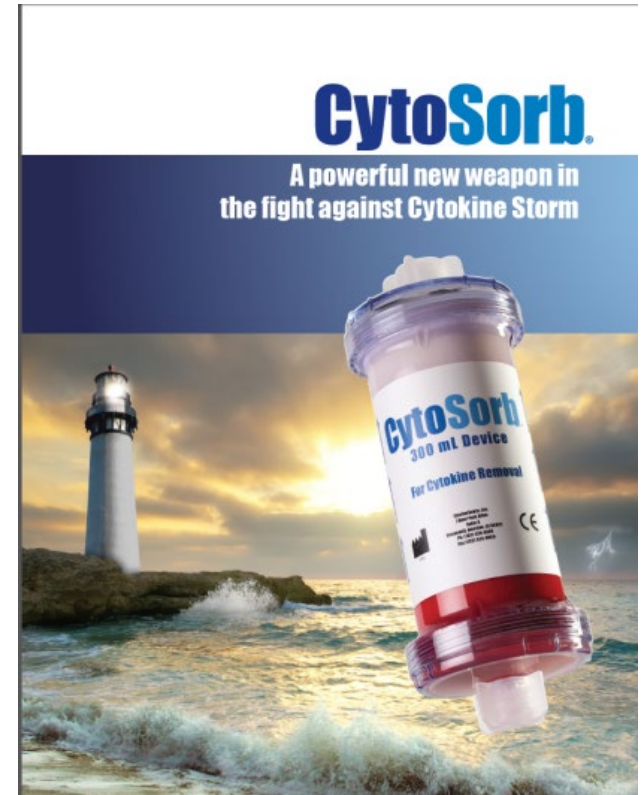
CytoSorbents Corporation

NASDAQ: CTSO

Investor Relations Contact

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