
UNITED STATES
SECURITIES AND EXCHANGE COMMISSION
WASHINGTON, DC 20549

FORM 8-K

CURRENT REPORT

Pursuant to Section 13 or 15(d) of the
Securities Exchange Act of 1934

Date of report (Date of earliest event reported): January 7, 2011

MEDICINOVA, INC.

(Exact name of Registrant as Specified in Its Charter)

DELAWARE
(State or Other Jurisdiction
of Incorporation)

001-33185
(Commission
File Number)

33-0927979
(IRS Employer
Identification No.)

4350 LA JOLLA VILLAGE DRIVE, SUITE 950, SAN DIEGO, CA
(Address of Principal Executive Offices)

92122
(Zip Code)

Registrant's telephone number, including area code: (858) 373-1500

Not Applicable
(Former Name or Former Address, if Changed Since Last Report)

Check the appropriate box below if the Form 8-K filing is intended to simultaneously satisfy the filing obligation of the registrant under any of the following provisions (see General Instruction A.2. below):

- Written communications pursuant to Rule 425 under the Securities Act (17 CFR 230.425)
 - Soliciting material pursuant to Rule 14a-12 under the Exchange Act (17 CFR 240.14a-12)
 - Pre-commencement communications pursuant to Rule 14d-2(b) under the Exchange Act (17 CFR 240.14d-2(b))
 - Pre-commencement communications pursuant to Rule 13e-4(c) under the Exchange Act (17 CFR 240.13e-4(c))
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Item 7.01. Regulation FD Disclosure.

On January 7, 2011, MediciNova, Inc. (the "Registrant") updated the slide presentation to be used by the Registrant at investor meetings. A copy of the revised slide presentation is attached hereto as Exhibit 99.1.

The information in this Current Report on Form 8-K being provided under this Item 7.01, including Exhibit 99.1 furnished herewith, is being furnished and shall not be deemed "filed" for any purpose of Section 18 of the Securities Exchange Act of 1934, as amended (the "Exchange Act"), or otherwise subject to the liabilities of such Section. The information in this current report on Form 8-K shall not be deemed to be incorporated by reference into any filing under the Securities Act of 1933, as amended, or the Exchange Act, except as shall be expressly set forth by specific reference in such filing.

Item 9.01. Financial Statements and Exhibits.

(d) Exhibits.

99.1 Slide Presentation of the Registrant.

SIGNATURES

Pursuant to the requirements of the Securities Exchange Act of 1934, MediciNova has duly caused this report to be signed on its behalf by the undersigned hereunto duly authorized.

MEDICINOVA, INC.

Date: January 7, 2011

By: _____ /s/ SHINTARO ASAKO
Name: **Shintaro Asako**
Title: **Chief Financial Officer**



*Accelerating
the global development
and commercialization of
innovative pharmaceuticals*



Forward-Looking Statements

Statements in this presentation that are not historical in nature constitute forward-looking statements within the meaning of the safe harbor provisions of the Private Securities Litigation Reform Act of 1995. These forward-looking statements include statements regarding MediciNova's clinical trials supporting the safety and efficacy of its product candidates and the potential novelty of such product candidates as treatments for disease, plans and objectives for clinical trials and product development, strategies, future performance, expectations, assumptions, financial condition, liquidity and capital resources. These forward-looking statements may be preceded by, followed by or otherwise include the words "believes," "expects," "anticipates," "intends," "estimates," "projects," "can," "could," "may," "will," "would," or similar expressions. Actual results or events may differ materially from those expressed or implied in any forward-looking statements due to various factors, including the risks and uncertainties inherent in clinical trials and product development and commercialization, such as the uncertainty in results of clinical trials for product candidates, the uncertainty of whether the results of clinical trials will be predictive of results in later stages of product development, the risk of delays or failure to obtain or maintain regulatory approval, the risk of failure of the third parties upon whom MediciNova relies to conduct its clinical trials and manufacture its product candidates to perform as expected, the risk of increased cost and delays due to delays in the commencement, enrollment, completion or analysis of clinical trials or significant issues regarding the adequacy of clinical trial designs or the execution of clinical trials and the timing, cost and design of future clinical trials and research activities; the timing of expected filings with the FDA; MediciNova's failure to execute strategic plans or strategies successfully; MediciNova's collaborations with third parties; MediciNova's ability to realize the anticipated strategic and financial benefits from its acquisition of Avigen, Inc., to integrate the two ibudilast development programs and to pursue discussions with potential partners to secure a strategic collaboration to advance the clinical development of the combined development program; the availability of funds to complete product development plans and MediciNova's ability to raise sufficient capital when needed, or at all; MediciNova's ability to comply with the covenants in its financing agreements; intellectual property or contract rights; and the other risks and uncertainties described in MediciNova's filings with the Securities and Exchange Commission, including MediciNova's annual report on Form 10-K for the year ended December 31, 2009 and its subsequent periodic reports on Forms 10-Q and 8-K. You are cautioned not to place undue reliance on these forward-looking statements, which speak only as of January 7, 2010. MediciNova disclaims any intent or obligation to revise or update these forward-looking statements.



Corporate Overview: MediciNova, Inc.

MediciNova Overview:

- Founded in September 2000
- Headquartered in San Diego, CA
 - Additional office in Tokyo, Japan
- Dual-listing on NasdaqGM as **MNOV** Osaka Securities Exchange as **4875**
- \$65.5 million Market Cap (NasdaqGM) as of 1/05/2011

Development Company Focused on Differentiated Product Candidates

- Unique access to differentiated, potentially high-value assets primarily from Japanese alliances (Kyorin, Kissei, Mitsubishi Tanabe Pharma, Meiji)

New Approaches to Treat Serious Medical Conditions:

- MN-221: Intravenous (IV) acute asthma and COPD candidate
 - Potential \$1 billion+ combined market opportunity worldwide*
- MN-166: oral multiple sclerosis, neuropathic pain, drug addiction candidate

**Source: Internal MediciNova projections*



MN-221 for Exacerbations of Acute Asthma and COPD

Definition:

- Long-lasting and severe episodes that are not responsive to initial bronchodilator or corticosteroid therapies

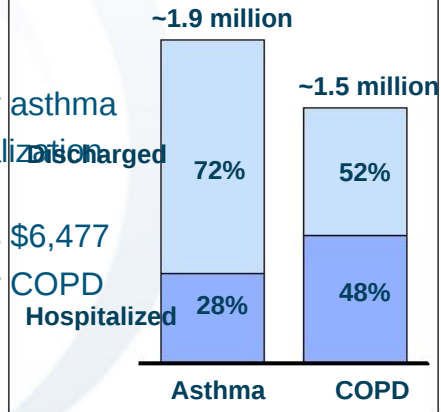
Market Opportunity*:

- ~500,000 annual hospitalizations in the US for asthma
 - Average length of stay for asthma hospitalization is 3.2 days
 - Average cost for asthma hospitalization is \$6,477
- ~726,000 annual hospitalizations in the US for COPD
 - ~119,000 deaths due to COPD

Current Standard of Care (SOC):

- Inhaled Beta agonists, inhaled anticholinergics, and IV or oral corticosteroids

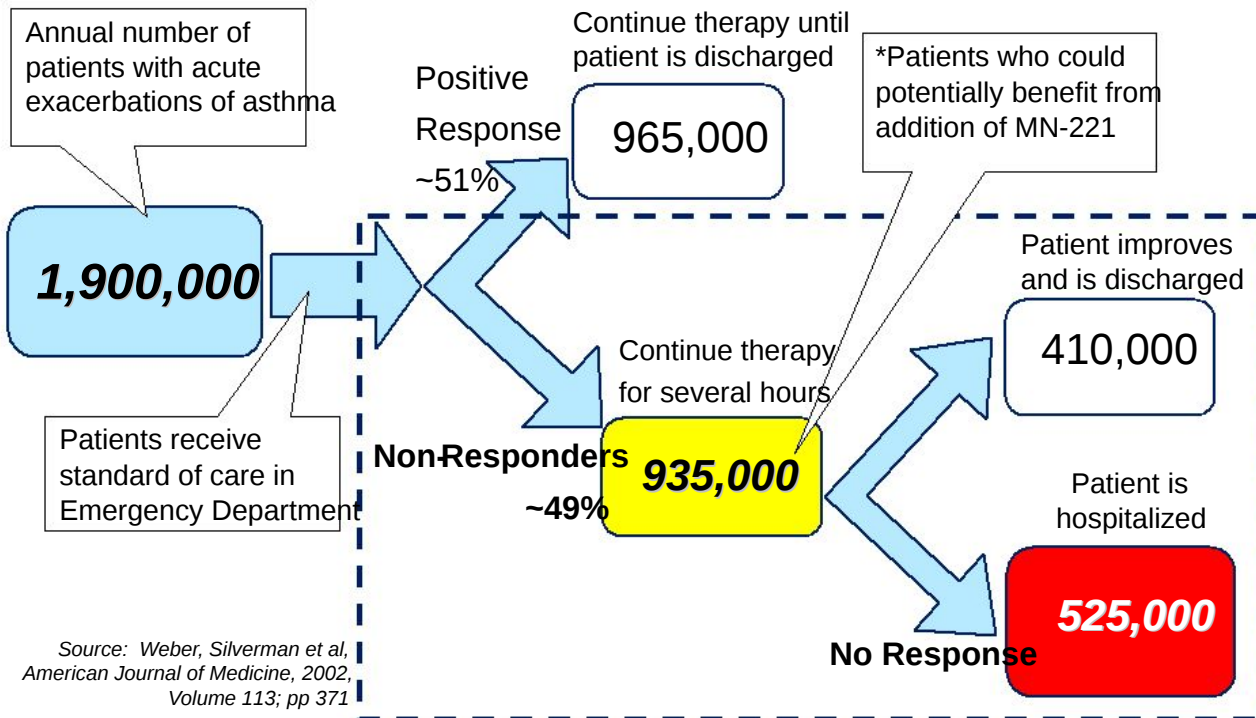
Hospitalization Rates Amongst Asthma and COPD Patients*



*Source: National Center for Health Statistics / CDC, WHO website, "Core Health indicators", 2006 National Hospital Discharge Survey, IMS Health's Disease and Condition Benchmarks – PharMetrics Integrated Database, 1/2007 – 12/2008



Acute Asthma Treatment Flow in Emergency Departments in the U.S.





Limitations of Current Therapies

What are the limitations of current therapies for acute exacerbations of asthma?

Limitations of Inhaled Therapies:

- **Bronchoconstriction** inflammation and bronchoconstriction result in insufficient air flow to get good drug deposition in the lungs
- **Mucus Plug Formation** mucus secretion and the formation of thick mucus plugs can cause persistent air flow limitation
- **Albuterol Non-Responders** not all patients benefit from albuterol

Limitations of Current Intravenous Therapies:

- **Safety** currently available options (e.g. epinephrine, terbutaline) have unacceptable cardiovascular risks at doses used



MN-221: A New Approach to Treating Exacerbations of Acute Asthma & COPD

MN-221: A novel, highly selective β_2 -adrenergic receptor agonist

Three potential advantages over current therapy:

- 1. Improved Efficacy**
 - Route of Administration (IV v. Inhalation)
- 2. Improved Safety**
 - Higher selectivity for β_2 receptor than β_1
 - Partial agonist for β_2 receptor
- 3. Reduced Health Care Expenses**



MN-221: Target Product Profile

MN-221 Indication: Treatment of bronchospasms in patients with acute exacerbations of asthma or COPD. It is administered adjunctive to standard of care by intravenous infusion.

- A well-tolerated, potent, selective β_2 -agonist which is only a partial agonist at β_1 .
- A bronchodilator duration of action that is longer than SABAs and shorter than LABAs.
- Provides additional bronchodilation when used in addition to the standard treatments of inhaled albuterol, inhaled ipratropium, and steroids.
- Reduces the hospitalization rate among patients treated with MN-221.
- No clinically significant adverse effects when added to standard of care (SOC).



MN-221 Clinical Trials

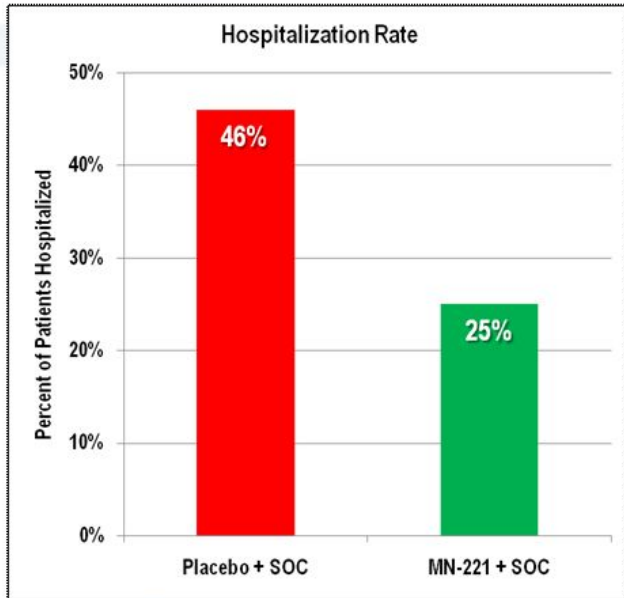
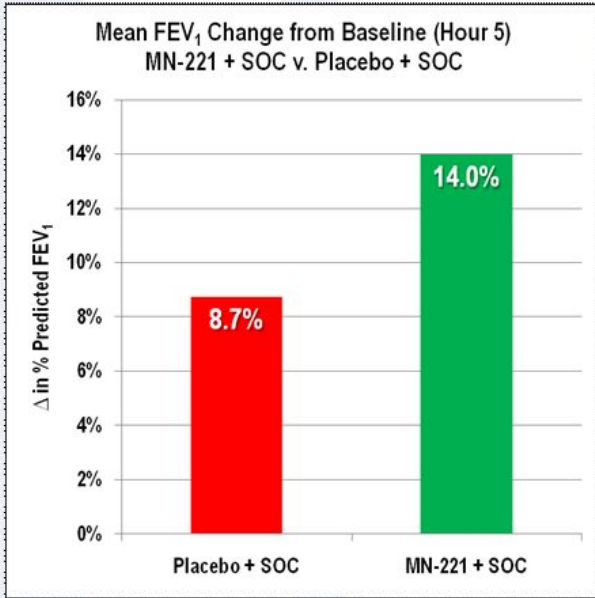
	Completed				Ongoing
Study	CL-004	CL-005	CL-006	CL-010	CL-007
Indication	Mild-to-moderate Asthmatics	Moderate-to-Severe Asthmatics	Acute Exacerbations of Asthma	Moderate-to-Severe COPD patients	Acute Exacerbations of Asthma
FEV ₁ (Entry Criteria)	FEV ₁ ≥ 60%	75% ≥ FEV ₁ ≥ 40%	FEV ₁ ≤ 55%	80% ≥ FEV ₁ ≥ 30%	FEV ₁ ≤ 50%
Number of Patients	23	17	29	48	200
Number of Sites	4	4	8	6	~20
Doses Tested Compared to Placebo	5.25, 15, 52.5, 150, 240, 450, 900 µg over 15 min	5.25, 15, 52.5, 1080 µg over 2-hr; 1,125 µg over 1-hr	240, 450 µg over 15 min; 1080 µg over 2-hr	300, 600, 1200 µg over 1-hr	1200 µg over 1-hr

Note: CL-004, CL-005, CL-010 located in clinical sites. CL-006, CL-007 located in emergency departments.



MN-221-CL-006

Mean Change in FEV₁ and Differences in Hospitalization Rate



Mean change in FEV₁ from baseline was 5.3% higher in the MN-221 dose groups versus the placebo group

MN-221 reduced the hospitalization rate by 45%



MN-221-CL-007: Study Design

- Randomized, placebo-controlled, double-blind, multi-center Phase II clinical trial
- Upto 200 patients with severe acute exacerbations of asthma ($FEV_1 = 50\%$ predicted) at multiple Emergency Department sites in the United States
- Dose Groups (up to 100 patients/group):
 - 1,200 μ g MN-221 over 1 hour (600 μ g 15 minutes; 600 μ g ext 45 minutes)
 - Placebo
- Patients will receive SOC treatment in addition to adjunctive treatment with MN-221 or placebo
- Primary efficacy endpoint will be improvement in FEV_1 (% predicted) at 3 hours
 - *The study is designed to have 80% power to detect a treatment difference of 5 percentage points in FEV_1 (% predicted) when comparing MN-221 + SOC to Placebo + SOC at a two sided α -level of 0.05.*
- Anticipated completion in 2H, 2011*

**Anticipated completion date based on current projections*

Note: Development plans / timelines for MN-221 clinical trials are subject to change



Ibudilast for the Treatment of MS, Neuropathic Pain, & Drug Addiction

Ibudilast (MN-166/AV411)

- Oral administration
- Safe and well-tolerated (approved in Japan/Korea with over 3.2 million patient exposure)
- Mechanism(s) of Action primarily Inhibition of Microphage Migration Inhibitor Factor (MIF), PDE-4,10 inhibition; Attenuation of Glial Cell Activation

Clinical Safety & Preliminary Efficacy

- Completed Phase 2 Multiple Sclerosis Proof-of-Concept study (30 and 60 mg/d, predominately RRMS pts.)
- Completed Phase 1b/2a trial in Diabetic Neuropathic Pain (40 mg/d)
- Completed Phase 1b/2a clinical trial in Opioid Withdrawal & Analgesia (40 and 80 mg/d) (Columbia Univ/NYSPI via NIDA funding)
- Ongoing Phase 1b Methamphetamine interaction trial (UCLA via NIDA funding)
- Additional Supporting Data
 - 3 completed Phase 1 clinical trials
 - Dosing up to 100 mg single dose & 100 mg daily (50 mg twice/day)
 - ~400 subjects treated with MN-166/AV411 to date (safe & well-tolerated)



Ibutilast (MN-166/AV411): Status for Each Indication

Status for Chronic Pain:

- MN-166/AV411 is enabled to go directly to Phase 2b clinical development
- MN-166/AV411 mechanism of action is novel and thus complementary to current pain treatments, and has both stand-alone and adjunctive utilities
- Majority of potential pharmaceutical partners are strategically committed to new pain therapies
- MN-166/AV411 has an attractive development timeline and long term exclusivity

Status for Drug Addiction/Opoid Withdrawal:

- Announced positive safety/efficacy results from Phase 1b/2a study in Oxycodone (12/10)
- UCLA initiated Phase 1 study for Methamphetamine Addiction (9/10)

Status for Multiple Sclerosis:

- MN-166/AV411 requires significant funding for future trials
- Phase 2 data were at doses that are below maximum utility
- Most attractive option may be Progressive MS which would require a Phase 2b clinical trial



Ibutilast Neuropathic Pain Market Opportunity

Drug	Company	Total Rx's in 2009 (US)
Lyrica®	Pfizer	9.1 Million
Cymbalta®	Eli Lilly	14.7 Million
Neurontin® (Gabapentin)	Pfizer	23.4 Million
	Total	47.1 Million
Neuropathic Pain Annual Market Opportunity:		~\$8.0 Billion†

- Prevalence is approximately 4.2 million neuropathic pain patients in the U.S. and 40 million worldwide

- MN-166 has a different mechanism of action than currently marketed neuropathic pain therapies

- MN-166 has potential to capture substantial market share in the neuropathic pain market

*Source: SDI/Verispan, Lilly and Pfizer Quarterly Reports

† Market Value Calculated at Branded Prices

Approved indications: Lyrica: Neuropathic pain associated with diabetic peripheral neuropathy, postherpetic neuralgia, partial onset seizures, fibromyalgia, Neurontin: postherpetic neuralgia, partial onset seizures Cymbalta: Major Depressive Disorder, Generalized Anxiety Disorder, Diabetic Peripheral Neuropathic Pain, Fibromyalgia



Patent/Commercial Overview

Method of Use

Composition of Matter

MS

Exp. 2018

Ibuprofen +
Immunomodulator
for MS

N. Pain

Exp. 2025

Acute & Sub-
chronic Pain

**MIF Inh.
screen**

Exp. 2027

Addiction

**Progressive
MS**

AV1013

Exp. 2027

**2nd Generation
Analog**

**AV1013
Enantiomer**

Key:

**Issued or
allowed**

Pending



Most Likely Scenario for Ibuprofen's Development

Collaboration Structure with Partner:

1. Shared Risk
2. All indications; Ibuprofen analogues
3. Option Agreement around Phase 2b Diabetic Peripheral Neuropathic Pain and/or Progressive MS Trial with Exclusive License, Development Milestones, Royalties, Sales Milestones.

Sustain NIDA-sponsored Drug Addiction development

Consider Investigator-sponsored Neurological Trials








Commercially-Attractive Diversified Portfolio

Core Candidates	Preclinical	Phase I	Phase II	Phase III
MN-166 (MS and other CNS Disorders)		Pain/Addiction	MS	
MN-221 (Exacerbations of Acute Asthma/COPD)	KISSEI	COPD	Asthma	
Non-Core Candidates	Preclinical	Phase I	Phase II	Phase III
MN-001 (Bronchial Asthma)				
MN-305 (Anxiety Disorders)				
MN-001 (Interstitial Cystitis)				
MN-029 (Solid Tumors)				
MN-221 (Preterm Labor)	KISSEI			
MN-246 (Urinary Incontinence)				
MN-447/462 (Thrombosis)				



Management Team with Global Experience

	Leadership	Years Experience	Background
	Yuichi Iwaki, MD, PhD CEO & President	35	Professor at USC, formerly Professor at University of Pittsburgh; Advisor to JAFCO, Tanabe
	Shintaro Asako, CPA Chief Financial Officer	13	KPMG USA (Audit), Arthur Andersen USA
	Kirk Johnson, Ph.D. Chief Scientific Officer	21	Avigen, Genesoft Pharmaceuticals, Chiron Corporation
	Michael Coffee Chief Business Officer	26	Avigen, Amarin Corp., Elan Pharmaceuticals, N.A., Athena Neurosciences
	Masatsune Okajima, CMA VP, Head of Japanese Office	19	Daiwa Securities SMBC, Sumitomo Capital Securities, Sumitomo Bank



Investment Highlights

Upcoming Near-Term Business Milestones:

1. Secure a global partnership for Ibudilast (MN-166/AV411)
2. Secure a strategic partnership for MN-221

Upcoming Clinical Milestones:

1. MN-221-CL-007 Phase II Study for Acute Exacerbations of Asthma
 - Anticipated completion in 2H, 2011*

Completed Milestones in 2010:

1. Announced Positive MN-221-CL-010 Phase Ib Study Results in Moderate-to-Severe COPD Patients on March 17, 2010
3. Secured \$15M Debt Financing from Oxford Finance Corp. ~~2010~~ May 10,
4. Announced Positive Safety and Efficacy data for Ibudilast (MN-166/AV411) Phase Ib/2a Study Results for Opioid Withdrawal and Analgesia on December 13, 2010

**Anticipated completion dates based on current projections*