

MASSMUTUAL PARTICIPATION INVESTORS

Form N-Q

May 28, 2010

=====

UNITED STATES
SECURITIES AND EXCHANGE COMMISSION
WASHINGTON, D.C. 20549

FORM N-Q

Quarterly Schedule of Portfolio Holdings of
Registered Management Investment Company

Investment Company Act file number 811-05531

MassMutual Participation Investors

(Exact name of registrant as specified in charter)

1500 Main Street, Springfield, MA 01115

(Address of principal executive offices) (Zip code)

Patricia J. Walsh, Vice President and Secretary,
1500 Main Street, Suite 2800, Springfield, MA 01115

(Name and address of agent for service)

Registrant's telephone number, including area code: 413-226-1000

Date of fiscal year end: 12/31

Date of reporting period: 03/31/10

=====

ITEM 1. SCHEDULE OF INVESTMENTS.

Edgar Filing: MASSMUTUAL PARTICIPATION INVESTORS - Form N-Q

MassMutual Participation Investors

CONSOLIDATED SCHEDULE OF INVESTMENTS
 March 31, 2010
 (Unaudited)

	Principal Amount Shares, Units or Ownership Percentage -----	Acquisition Date -----
CORPORATE RESTRICTED SECURITIES - 91.27%: (A)		
PRIVATE PLACEMENT INVESTMENTS - 87.51%		
A E COMPANY, INC.		
A designer and manufacturer of machined parts and assembly structures for the commercial and military markets.		
11% Senior Secured Note due 2015	\$ 807,692	*
13% Senior Subordinated Note due 2016	\$ 807,693	11/10/09
Common Stock (B)	184,615 shs.	11/10/09
Warrant, exercisable until 2019, to purchase common stock at \$.01 per share (B)	92,308 shs.	11/10/09
* 11/10/09 and 11/18/09.		
A H C HOLDING COMPANY, INC.		
A designer and manufacturer of boilers and water heaters for the commercial sector.		
15% Senior Subordinated Note due 2015	\$ 1,322,210	11/21/07
Limited Partnership Interest (B)	12.26% int.	11/21/07
A S A P INDUSTRIES LLC		
A designer and manufacturer of components used on oil and natural gas wells.		
12.5% Senior Subordinated Note due 2015	\$ 450,500	12/31/08
Limited Liability Company Unit Class A-2 (B)	677 uts.	12/31/08
Limited Liability Company Unit Class A-3 (B)	608 uts.	12/31/08
A S C GROUP, INC.		
A designer and manufacturer of high reliability encryption equipment, communications products, components primarily for the military and aerospace sectors.		
12.75% Senior Subordinated Note due 2016	\$ 1,227,273	10/09/09
Limited Liability Company Unit Class A (B)	1,249 uts.	10/09/09
Limited Liability Company Unit Class B (B)	1,473 uts.	10/09/09
A W X HOLDINGS CORPORATION		
A provider of aerial equipment rental, sales and repair services to non-residential construction operating in the State of Indiana.		
10.5% Senior Secured Term Note due 2014	\$ 420,000	05/15/08
13% Senior Subordinated Note due 2015	\$ 420,000	05/15/08
Common Stock (B)	60,000 shs.	05/15/08
Warrant, exercisable until 2015, to purchase common stock at \$.01 per share (B)	21,099 shs.	05/15/08

Edgar Filing: MASSMUTUAL PARTICIPATION INVESTORS - Form N-Q

CONSOLIDATED SCHEDULE OF INVESTMENTS (CONTINUED)
 March 31, 2010
 (Unaudited)

CORPORATE RESTRICTED SECURITIES: (A) (Continued)	Principal Amount Shares, Units or Ownership Percentage -----	Acquisition Date -----
ADVANCED TECHNOLOGIES HOLDINGS		
A provider of factory maintenance services to industrial companies.		
15% Senior Subordinated Note due 2013	\$ 1,155,508	12/27/07
Preferred Stock (B)	546 shs.	12/27/07
AERO HOLDINGS, INC.		
A provider of geospatial services to corporate and government clients.		
10.5% Senior Secured Term Note due 2014	\$ 930,000	03/09/07
14% Senior Subordinated Note due 2015	\$ 720,000	03/09/07
Common Stock (B)	150,000 shs.	03/09/07
Warrant, exercisable until 2015, to purchase common stock at \$.01 per share (B)	37,780 shs.	03/09/07
ALL CURRENT HOLDING COMPANY		
A specialty re-seller of essential electrical parts and components primarily serving wholesale di		
12% Senior Subordinated Note due 2015	\$ 603,697	09/26/08
Common Stock (B)	713 shs.	09/26/08
Warrant, exercisable until 2018, to purchase common stock at \$.01 per share (B)	507 shs.	09/26/08
AMERICAN HOSPICE MANAGEMENT HOLDING LLC		
A for-profit hospice care provider in the United States.		
12% Senior Subordinated Note due 2013	\$ 1,687,503	*
Preferred Class A Unit (B)	1,706 uts.	**
Preferred Class B Unit (B)	808 uts.	06/09/08
Common Class B Unit (B)	16,100 uts.	01/22/04
Common Class D Unit (B)	3,690 uts.	09/12/06
* 01/22/04 and 06/09/08. ** 01/22/04 and 09/12/06.		
APEX ANALYTIX HOLDING CORPORATION		
A provider of audit recovery and fraud detection services and software to commercial and retail b		
12.5% Senior Subordinated Note due 2016	\$ 1,012,500	04/28/09
Preferred Stock Series B (B)	1,623 shs.	04/28/09
Common Stock (B)	723 shs.	04/28/09

8

Edgar Filing: MASSMUTUAL PARTICIPATION INVESTORS - Form N-Q

March 31, 2010
(Unaudited)

CORPORATE RESTRICTED SECURITIES: (A) (Continued)	Principal Amount Shares, Units or Ownership Percentage -----	Acquisition Date -----
ARROW TRU-LINE HOLDINGS, INC.		
A manufacturer of hardware for residential and commercial overhead garage doors in North America.		
14% Senior Subordinated Note due 2012	\$ 984,209	05/18/05
Preferred Stock (B)	33 shs.	10/16/09
Common Stock (B)	263 shs.	05/18/05
Warrant, exercisable until 2012, to purchase common stock at \$.01 per share (B)	69 shs.	05/18/05
BRAVO SPORTS HOLDING CORPORATION		
A designer and marketer of niche branded consumer products including canopies, trampolines, in-line urethane wheels.		
12.5% Senior Subordinated Note due 2014	\$ 1,207,902	06/30/06
Preferred Stock Class A (B)	465 shs.	06/30/06
Common Stock (B)	1 sh.	06/30/06
Warrant, exercisable until 2014, to purchase common stock at \$.01 per share (B)	164 shs.	06/30/06
C D N T, INC.		
A value-added converter and distributor of specialty pressure sensitive adhesives, foams, films,		
10.5% Senior Secured Term Note due 2014	\$ 429,070	08/07/08
12.5% Senior Subordinated Note due 2015	\$ 429,070	08/07/08
Common Stock (B)	41,860 shs.	08/07/08
Warrant, exercisable until 2018, to purchase common stock at \$.01 per share (B)	32,914 shs.	08/07/08
CAPITAL SPECIALTY PLASTICS, INC.		
A producer of desiccant strips used for packaging pharmaceutical products.		
Common Stock (B)	55 shs.	*
* 12/30/97 and 05/29/99.		
CLOUGH, HARBOUR AND ASSOCIATES		
An engineering service firm that is located in Albany, NY.		
12.25% Senior Subordinated Note due 2015	\$ 1,270,588	12/02/08
Preferred Stock (B)	147 shs.	12/02/08

CONSOLIDATED SCHEDULE OF INVESTMENTS (CONTINUED)
March 31, 2010
(Unaudited)

Edgar Filing: MASSMUTUAL PARTICIPATION INVESTORS - Form N-Q

CORPORATE RESTRICTED SECURITIES: (A) (Continued)	Principal Amount Shares, Units or Ownership Percentage -----	Acquisition Date -----
COEUR, INC.		
A producer of proprietary, disposable power injection syringes.		
12% Senior Subordinated Note due 2016	\$ 642,857	10/10/08
Common Stock (B)	321 shs.	10/10/08
Warrant, exercisable until 2018, to purchase common stock at \$.01 per share (B)	495 shs.	10/10/08
CONNECTICUT ELECTRIC, INC.		
A supplier and distributor of electrical products sold into the retail and wholesale markets.		
12% Senior Subordinated Note due 2014	\$ 1,267,387	01/12/07
Limited Liability Company Unit Class A (B)	82,613 uts.	01/12/07
Limited Liability Company Unit Class C (B)	59,756 uts.	01/12/07
CONNOR SPORT COURT INTERNATIONAL, INC.		
A designer and manufacturer of outdoor and indoor synthetic sports flooring and other temporary f		
Preferred Stock Series B-2 (B)	9,081 shs.	07/05/07
Preferred Stock Series C (B)	4,757 shs.	07/05/07
Common Stock (B)	380 shs.	07/05/07
Limited Partnership Interest (B)	6.8 8% int.	*
*08/12/04 and 01/14/05.		
COREPHARMA LLC		
A manufacturer of oral dose generic pharmaceuticals targeted at niche applications.		
12% Senior Subordinated Note due 2013	\$ 1,350,000	08/04/05
Warrant, exercisable until 2013, to purchase common stock at \$.001 per share (B)	10 shs.	08/04/05
CRANE RENTAL CORPORATION		
A crane rental company.		
13% Senior Subordinated Note due 2015	\$ 1,215,000	08/21/08
Common Stock (B)	135,000 shs.	08/21/08
Warrant, exercisable until 2016, to purchase common stock at \$.01 per share (B)	72,037 shs.	08/21/08

10

MassMutual Participation Investors

CONSOLIDATED SCHEDULE OF INVESTMENTS (CONTINUED)
March 31, 2010
(Unaudited)

Principal Amount
Shares, Units

Edgar Filing: MASSMUTUAL PARTICIPATION INVESTORS - Form N-Q

CORPORATE RESTRICTED SECURITIES: (A) (Continued)	or Ownership Percentage -----	Acquisition Date -----
CUSTOM ENGINEERED WHEELS, INC.		
A manufacturer of custom engineered, non-pneumatic plastic wheels and plastic tread cap tires use products and wheelchairs.		
12.5% Senior Subordinated Note due 2016	\$ 1,155,288	10/27/09
Preferred Stock PIK	156 shs.	10/27/09
Preferred Stock Series A	114 shs.	10/27/09
Common Stock (B)	38 shs.	10/27/09
Warrant, exercisable until 2016, to purchase common stock at \$.01 per share (B)	28 shs.	10/27/09
DAVIS-STANDARD LLC		
A manufacturer, assembler, and installer of a broad range of capital equipment that is used in the processing of plastic materials.		
12% Senior Subordinated Note due 2014	\$ 978,261	10/30/06
Limited Partnership Interest (B)	0.97% int.	10/30/06
Warrant, exercisable until 2014, to purchase preferred stock at \$.01 per share (B)	26 shs.	10/30/06
Warrant, exercisable until 2014, to purchase common stock at \$.01 per share (B)	18 shs.	10/30/06
DIVERSCO, INC./DHI HOLDINGS, INC.		
A contract provider of janitorial and equipment maintenance services and temporary production labor		
Membership Interests of MM/Lincap Diversco Investments Ltd. LLC (B)	13.57% int.	08/27/98
Preferred Stock (B)	1,293 shs.	12/14/01
Warrants, exercisable until 2011, to purchase common stock of DHI Holdings, Inc. at \$.01 per share (B)	6,676 shs.	*
* 10/24/96 and 08/28/98.		
DUNCAN SYSTEMS, INC.		
A distributor of windshields and side glass for the recreational vehicle market.		
10% Senior Secured Term Note due 2013	\$ 231,429	11/01/06
13% Senior Subordinated Note due 2014	\$ 488,572	11/01/06
Common Stock (B)	102,857 shs.	11/01/06
Warrant, exercisable until 2014, to purchase common stock at \$.01 per share (B)	32,294 shs.	11/01/06
DWYER GROUP, INC.		
A franchiser of a variety of home repair services.		
Common Stock (B)	3,656 shs.	*
Warrant, exercisable until 2011, to purchase common stock at \$.01 per share (B)	1,077 shs.	10/30/03
*10/30/03 and 01/02/04.		

CONSOLIDATED SCHEDULE OF INVESTMENTS (CONTINUED)

Edgar Filing: MASSMUTUAL PARTICIPATION INVESTORS - Form N-Q

March 31, 2010
(Unaudited)

CORPORATE RESTRICTED SECURITIES: (A) (Continued)	Principal Amount Shares, Units or Ownership Percentage -----	Acquisition Date -----
E S P HOLDCO, INC.		
A manufacturer of power protection technology for commercial office equipment, primarily supplying network.		
14% Senior Subordinated Note due 2015	\$ 1,228,850	01/08/08
Common Stock (B)	349 shs.	01/08/08
E X C ACQUISITION CORPORATION		
A manufacturer of pre-filled syringes and pump systems used for intravenous drug delivery.		
Warrant, exercisable until 2014, to purchase common stock at \$.01 per share (B)	11 shs.	06/28/04
EATEM HOLDING COMPANY		
A developer and manufacturer of savory flavor systems for soups, sauces, gravies, and other products for retail and foodservice end products.		
12.5% Senior Subordinated Note due 2018	\$ 950,000	02/01/10
Common Stock	50 shs.	02/01/10
Warrant, exercisable until 2018, to purchase common stock at \$.01 per share (B)	119 shs.	02/01/10
F C X HOLDINGS CORPORATION		
A distributor of specialty/technical valves, actuators, accessories, and process instrumentation high purity, and energy end markets in North America.		
15% Senior Subordinated Note due 2015	\$ 1,169,376	10/06/08
Preferred Stock (B)	2,298 shs.	10/06/08
Common Stock (B)	1,625 shs.	10/06/08
F H S HOLDINGS LLC		
A national provider of customized disease management services to large self-insured employers.		
12% Senior Subordinated Note due 2014 (D)	\$ 1,265,625	06/01/06
Limited Liability Company Units of Linden/FHS Holdings LLC (B)	84 uts.	06/01/06
Common Unit Class B (B)	734 uts.	06/01/06
FLUTES, INC.		
An independent manufacturer of micro fluted corrugated sheet material for the food and consumer products.		
10% Senior Secured Term Note due 2013 (D)	\$ 524,791	04/13/06
14% Senior Subordinated Note due 2014 (D)	\$ 317,177	04/13/06

12

Edgar Filing: MASSMUTUAL PARTICIPATION INVESTORS - Form N-Q

CONSOLIDATED SCHEDULE OF INVESTMENTS (CONTINUED)
 March 31, 2010
 (Unaudited)

CORPORATE RESTRICTED SECURITIES: (A) (Continued)	Principal Amount Shares, Units or Ownership Percentage -----	Acquisition Date -----
GOLDEN COUNTY FOODS HOLDING, INC.		
A manufacturer of frozen appetizers and snacks.		
16% Senior Subordinated Note due 2015	\$ 1,012,500	11/01/07
16% PIK Note due 2015	\$ 212,282	12/31/08
8% Series A Convertible Preferred Stock, convertible into fully diluted common shares (B)	77,643 shs.	11/01/07
H M HOLDING COMPANY		
A designer, manufacturer, and importer of promotional and wood furniture.		
7.5% Senior Subordinated Note due 2013 (D)	\$ 362,700	10/15/09
Preferred Stock (B)	21 shs.	*
Preferred Stock Series B (B)	1,088 shs.	10/15/09
Common Stock (B)	180 shs.	02/10/06
Common Stock Class C (B)	296 shs.	10/15/09
Warrant, exercisable until 2013, to purchase common stock at \$.02 per share (B)	67 shs.	02/10/06
* 09/18/07 and 06/27/08.		
HIGHGATE CAPITAL LLC		
An acquirer of controlling or substantial interests in manufacturing and marketing entities.		
Series A Preferred Units (B)	0.30% int.	07/21/94
HOME DECOR HOLDING COMPANY		
A designer, manufacturer and marketer of framed art and wall decor products.		
12.5% Senior Subordinated Note due 2012	\$ 1,081,731	*
Common Stock (B)	33 shs.	*
Warrant, exercisable until 2012, to purchase common stock at \$.02 per share (B)	106 shs.	*
* 06/30/04 and 08/19/04.		
HOSPITALITY MINTS HOLDING COMPANY		
A manufacturer of individually-wrapped imprinted promotional mints.		
12% Senior Subordinated Note due 2016	\$ 1,098,837	08/19/08
Common Stock (B)	251 shs.	08/19/08
Warrant, exercisable until 2016, to purchase common stock at \$.01 per share (B)	65 shs.	08/19/08

CONSOLIDATED SCHEDULE OF INVESTMENTS (CONTINUED)
 March 31, 2010
 (Unaudited)

Edgar Filing: MASSMUTUAL PARTICIPATION INVESTORS - Form N-Q

CORPORATE RESTRICTED SECURITIES: (A) (Continued)	Principal Amount Shares, Units or Ownership Percentage -----	Acquisition Date -----
INSURANCE CLAIMS MANAGEMENT, INC.		
A third party administrator providing auto and property claim administration services for insurance		
Common Stock (B)	37 shs.	02/27/07
Warrant, exercisable until 2011, to purchase common stock at \$.01 per share (B)	11 shs.	02/27/07
INTERNATIONAL OFFSHORE SERVICES LLC		
A leading provider of marine transportation services, platform decommissioning, and salvage services in shallow waters of the Gulf of Mexico.		
14.25% Senior Subordinated Secured Note due 2017	\$ 1,350,000	07/07/09
Limited Liability Company Unit (B)	1,647 uts.	07/07/09
JASON, INC.		
A diversified manufacturing company serving various industrial markets.		
13% Senior Subordinated Note due 2010	\$ 510,187	08/04/00
Limited Partnership Interest of Saw Mill Capital Fund II, L.P. (B)	1.30% int.	08/03/00
Warrant, exercisable until 2010, to purchase common stock at \$.01 per share (B)	26,931 shs.	08/04/00
JUSTRITE MANUFACTURING ACQUISITION CO.		
A manufacturer of safety products such as storage cabinets and containers.		
12% Senior Subordinated Note due 2011	\$ 843,750	12/15/04
Warrant, exercisable until 2011, to purchase common stock at \$.01 per share (B)	594 shs.	12/15/04
K H O F HOLDINGS, INC.		
A manufacturer of premium disposable tableware products serving both the foodservice and consumer markets.		
14% Senior Subordinated Note due 2014	\$ 1,295,234	10/15/07
Common Stock (B)	116,827 shs.	10/15/07
K N B HOLDINGS CORPORATION		
A designer, manufacturer and marketer of products for the custom framing market.		
15.5% Senior Subordinated Note due 2013	\$ 1,595,057	05/25/06
Common Stock (B)	71,053 shs.	05/25/06
Warrant, exercisable until 2013, to purchase common stock at \$.01 per share (B)	43,600 shs.	05/25/06

Edgar Filing: MASSMUTUAL PARTICIPATION INVESTORS - Form N-Q

CONSOLIDATED SCHEDULE OF INVESTMENTS (CONTINUED)
 March 31, 2010
 (Unaudited)

CORPORATE RESTRICTED SECURITIES: (A) (Continued)	Principal Amount Shares, Units or Ownership Percentage -----	Acquisition Date -----
K P I HOLDINGS, INC.		
Pace Industries is the largest player in the U.S. non-automotive, non-ferrous die casting segment		
13% Senior Subordinated Note due 2014	\$ 1,115,217	07/16/08
Convertible Preferred Stock Series C (B)	29 shs.	06/30/09
Convertible Preferred Stock Series D (B)	13 shs.	09/17/09
Common Stock (B)	235 shs.	07/15/08
Warrant, exercisable until 2018, to purchase common stock at \$.01 per share (B)	388 shs.	*

* 07/16/08 and 09/17/09.

K W P I HOLDINGS CORPORATION		
A manufacturer and distributor of vinyl windows and patio doors throughout the northwestern United States		
18% Senior Subordinated Note due 2014	\$ 1,488,425	03/14/07
Common Stock (B)	123 shs.	03/13/07
Warrant, exercisable until 2019, to purchase preferred stock at \$.01 per share (B)	71 shs.	07/07/09
Warrant, exercisable until 2017, to purchase common stock at \$.01 per share (B)	89 shs.	03/14/07

K-TEK HOLDING CORPORATION		
A manufacturer of instrumentation for liquid and bulk solids level detection for process and storage		
14% Senior Subordinated Note due 2015	\$ 1,211,004	12/20/07
Preferred Stock (B)	192,314 shs.	12/20/07
Common Stock (B)	54,326 shs.	12/20/07

L H D EUROPE HOLDING, INC.		
A non-carbonated beverage dispensing company focused on the food service industry.		
Common Stock (B)	45 shs.	12/28/09

M V I HOLDING, INC.		
A manufacturer of large precision machined metal components used in equipment which services a variety of oil and gas, mining, and defense markets.		
13% Senior Subordinated Note due 2016	\$ 652,886	09/12/08
Common Stock (B)	32 shs.	09/12/08
Warrant, exercisable until 2018, to purchase common stock at \$.01 per share (B)	35 shs.	09/12/08

CONSOLIDATED SCHEDULE OF INVESTMENTS (CONTINUED)
 March 31, 2010
 (Unaudited)

Edgar Filing: MASSMUTUAL PARTICIPATION INVESTORS - Form N-Q

CORPORATE RESTRICTED SECURITIES: (A) (Continued)	Principal Amount Shares, Units or Ownership Percentage -----	Acquisition Date -----
MAIL COMMUNICATIONS GROUP, INC.		
A provider of mail processing and handling services, lettershop services, and commercial printing		
12.5% Senior Subordinated Note due 2014	\$ 516,177	05/04/07
Limited Liability Company Unit (B)	12,763 uts.	*
Warrant, exercisable until 2014, to purchase common stock at \$.01 per share (B)	1,787 shs.	05/04/07
* 05/04/07 and 01/02/08.		
MANHATTAN BEACHWEAR HOLDING COMPANY		
A designer and distributor of women's swimwear.		
12.5% Senior Subordinated Note due 2018	\$ 882,353	01/15/10
Common Stock (B)	118 shs.	01/15/10
Warrant, exercisable until 2019, to purchase common stock at \$.01 per share (B)	104 shs.	01/15/10
MAVERICK ACQUISITION COMPANY		
A manufacturer of capsules that cover the cork and neck of wine bottles.		
6.79% Senior Secured Tranche A Note due 2010 (C)	\$ 128,230	09/03/04
12.5% Senior Secured Tranche B Note due 2011	\$ 179,104	09/03/04
6.75% Senior Secured Revolver due 2011 (C)	\$ 29,105	09/03/04
Limited Partnership Interest (B)	4.48% int.	09/03/04
Warrant, exercisable until 2011, to purchase common stock at \$.01 per share (B)	243 shs.	09/03/04
MEDSYSTEMS HOLDINGS LLC		
A manufacturer of enteral feeding products, such as feeding tubes and other products related to a		
13% Senior Subordinated Note due 2015	\$ 617,585	08/29/08
Preferred Unit (B)	66 uts.	08/29/08
Common Unit Class A (B)	671 uts.	08/29/08
Common Unit Class B (B)	250 uts.	08/29/08
MEGTEC HOLDINGS, INC.		
A supplier of industrial and environmental products and services to a broad array of industries.		
12% Senior Subordinated Note due 2016	\$ 1,144,068	09/24/08
Preferred Stock (B)	56 shs.	09/24/08
Limited Partnership Interest (B)	0.74% int.	09/16/08
Warrant, exercisable until 2018, to purchase common stock at \$.01 per share (B)	18 shs.	09/24/08

16

Edgar Filing: MASSMUTUAL PARTICIPATION INVESTORS - Form N-Q

March 31, 2010
(Unaudited)

CORPORATE RESTRICTED SECURITIES: (A) (Continued)	Principal Amount Shares, Units or Ownership Percentage -----	Acquisition Date -----
 MICROGROUP, INC.		
A manufacturer of precision parts and assemblies, and a value-added supplier of metal tubing and 12% Senior Subordinated Note due 2013 (D)	\$ 1,421,795	*
Common Stock (B)	238 shs.	*
Warrant, exercisable until 2013, to purchase common stock at \$.02 per share (B)	87 shs.	*
 *08/12/05 and 09/11/06.		
 MILWAUKEE GEAR COMPANY		
A manufacturer of high-precision custom gears and gear drives used by original equipment manufacturing industries.		
13% Senior Subordinated Note due 2014	\$ 1,246,154	07/21/08
Preferred Stock (B)	139 shs.	07/21/08
Common Stock (B)	9 shs.	07/21/08
Warrant, exercisable until 2014, to purchase common stock at \$.01 per share (B)	6 shs.	07/21/08
 MOMENTUM HOLDING CO.		
A designer and supplier of upholstery fabric to commercial furniture manufacturers and architectural Limited Partnership Interest (B)	11.24% int.	08/04/06
Warrant, exercisable until 2014, to purchase common stock at \$.02 per share (B)	586 shs.	08/04/06
 MONESSEN HOLDING CORPORATION		
A designer and manufacturer of a broad line of gas, wood, and electric hearth products and accessories.		
14% Senior Subordinated Note due 2014 (D)	\$ 1,350,000	07/25/08
14% PIK Note due 2014 (D)	\$ 419,713	07/25/08
Warrant, exercisable until 2014, to purchase common stock at \$.02 per share (B)	81 shs.	03/31/06
 NABCO, INC.		
A producer of explosive containment vessels in the United States.		
14% Senior Subordinated Note due 2014	\$ 330,882	02/24/06
Limited Liability Company Unit (B)	437 uts.	*
Warrant, exercisable until 2016, to purchase common stock at \$.01 per share (B)	68 shs.	02/24/06
 * 02/24/06 and 06/22/07.		

 CONSOLIDATED SCHEDULE OF INVESTMENTS (CONTINUED)
 March 31, 2010

Edgar Filing: MASSMUTUAL PARTICIPATION INVESTORS - Form N-Q

(Unaudited)

CORPORATE RESTRICTED SECURITIES: (A) (Continued)	Principal Amount Shares, Units or Ownership Percentage -----	Acquisition Date -----
NAVIS GLOBAL		
A designer, manufacturer, seller and servicer of finishing machinery for the knit and woven segments		
12% Senior Secured Term Note Series A due 2010	\$ 16,854	11/14/08
14% Senior Subordinated Note due 2014 (D)	\$ 764,921	05/28/04
10.75% Senior Secured Note due 2011 (D)	\$ 348,118	05/28/04
NESCO HOLDINGS CORPORATION		
A sales and leasing company that provides equipment to the electric utility, telecommunications,		
12% Senior Secured Subordinated Note due 2015	\$ 1,125,000	08/02/07
Common Stock (B)	225,000 shs.	08/02/07
Warrant, exercisable until 2015, to purchase common stock at \$.01 per share (B)	63,191 shs.	08/02/07
NETSHAPE TECHNOLOGIES, INC.		
A manufacturer of powder metal and metal injection molded precision components used in industrial		
12% Senior Subordinated Note due 2014	\$ 810,000	02/02/07
Limited Partnership Interest of Saw Mill PCG Partners LLC (B)	1.38% int.	02/01/07
Limited Liability Company Unit Class D of Saw Mill PCG Partners LLC (B)	8 uts.	*
Limited Liability Company Unit Class D- 1 of Saw Mill PCG Partners LLC (B)	43 uts.	09/30/09
Preferred Stock Class A (B)	1 sh.	12/18/08
Preferred Stock Class A-1 (B)	4 shs.	09/30/09
Warrant, exercisable until 2014, to purchase common stock at \$.01 per share (B)	48 shs.	02/02/07
* 12/18/09 and 09/30/09.		
NORTHWEST MAILING SERVICES, INC.		
A producer of promotional materials for companies that use direct mail as part of their customer		
12% Senior Subordinated Note due 2016	\$ 1,207,895	07/09/09
Limited Partnership Interest (B)	1,421, uts.	07/09/09
Warrant, exercisable until 2019, to purchase common stock at \$.01 per share (B)	1,852 shs.	07/09/09

18

MassMutual Participation Investors

CONSOLIDATED SCHEDULE OF INVESTMENTS (CONTINUED)
March 31, 2010
(Unaudited)

Principal Amount

Edgar Filing: MASSMUTUAL PARTICIPATION INVESTORS - Form N-Q

CORPORATE RESTRICTED SECURITIES: (A) (Continued)	Shares, Units or Ownership Percentage -----	Acquisition Date -----
NYLONCRAFT, INC.		
A supplier of engineered plastic components for the automotive industry.		
10% Senior Secured Note due 2012	\$ 464,286	01/28/02
15% Senior Subordinated Note due 2012 (D)	\$ 285,714	01/28/02
Convertible Preferred Stock A (B)	571 shs.	01/28/02
Common Stock (B)	178,571 shs.	01/28/02
Warrant, exercisable until 2012, to purchase common stock at \$.01 per share (B)	138,928 shs.	01/28/02
OAKRIVER TECHNOLOGY, INC.		
Designs, engineers and assembles high precision automated process equipment for the medical device defibrillators and stents.		
10% Senior Secured Note due 2012	\$ 83,264	01/03/06
13% Senior Subordinated Note due 2013	\$ 392,709	01/03/06
Common Stock (B)	184,176 shs.	01/03/06
Warrant, exercisable until 2013, to purchase common stock at \$.01 per share (B)	43,073 shs.	01/03/06
OLYMPIC SALES, INC.		
A boat retailer in Washington state, Oregon, California and British Columbia.		
12% Senior Subordinated Note due 2010 (D)	\$ 511,000	08/07/98
12% Senior Subordinated Note due 2010 (D)	\$ 244,154	02/09/00
ONTARIO DRIVE & GEAR LTD.		
A manufacturer of all-wheel drive, off-road amphibious vehicles and related accessories. Limited Liability Company Unit (B)		
	1,942 uts.	01/17/06
Warrant, exercisable until 2013, to purchase common stock at \$.01 per share (B)	328 shs.	01/17/06
P A S HOLDCO LLC		
An independent provider of maintenance, repair and overhaul services to the aerospace gas turbine		
14% Senior Subordinated Note due 2014	\$ 1,236,634	07/03/06
Preferred Unit (B)	202 uts.	07/03/06
Preferred Unit (B)	36 uts.	07/03/06
Common Unit Class I (B)	78 uts.	07/03/06
Common Unit Class L (B)	17 uts.	07/03/06

CONSOLIDATED SCHEDULE OF INVESTMENTS (CONTINUED)
March 31, 2010
(Unaudited)

Principal Amount

Edgar Filing: MASSMUTUAL PARTICIPATION INVESTORS - Form N-Q

CORPORATE RESTRICTED SECURITIES: (A) (Continued)	Shares, Units or Ownership Percentage -----	Acquisition Date -----
P I I HOLDING CORPORATION		
A manufacturer of plastic film and bags for the general industrial, medical, and food industries.		
12% Senior Subordinated Note due 2013	\$ 1,215,000	03/31/06
Preferred Stock (B)	19 shs.	03/31/06
Common Stock (B)	12 shs.	03/31/06
Warrant, exercisable until 2013, to purchase common stock at \$.01 per share (B)	7 shs.	03/31/06
PACIFIC CONSOLIDATED HOLDINGS LLC		
A manufacturer of rugged, mobile liquid and gaseous oxygen and nitrogen generating systems used in and medical sectors.		
14% Senior Subordinated Note due 2012	\$ 704,835	04/27/07
Limited Liability Company Unit (B)	928,962 uts.	04/27/07
PARADIGM PACKAGING, INC.		
A manufacturer of plastic bottles and closures for the nutritional, pharmaceutical, personal care and medical sectors.		
14% Senior Subordinated Note due 2011	\$ 1,125,000	12/19/00
Membership Interests of MM/Lincap PPI Investments, Inc., LLC (B)	1.28% int.	12/21/00
PEARLMAN ENTERPRISES, INC.		
A developer and distributor of tools, equipment and supplies to the natural and engineered stone and medical sectors.		
Preferred Stock Series A (B)	1,236 shs.	05/22/09
Preferred Stock Series B (B)	7,059 shs.	05/22/09
Common Stock (B)	21.462 shs.	05/22/09
POSTLE ALUMINUM COMPANY LLC		
A manufacturer and distributor of aluminum extruded products.		
3% Senior Subordinated PIK Note due 2014 (D)	\$ 1,163,700	10/02/06
Limited Liability Company Unit Class A	733 uts.	10/02/06
Limited Liability Company Unit	76 uts.	05/22/09
Warrant, exercisable until 2016, to purchase common stock at \$.01 per share (B)	4,550 shs.	10/02/06

20

MassMutual Participation Investors

CONSOLIDATED SCHEDULE OF INVESTMENTS (CONTINUED)
March 31, 2010
(Unaudited)

Principal Amount	
Shares, Units	Acquisition
or Ownership	

Edgar Filing: MASSMUTUAL PARTICIPATION INVESTORS - Form N-Q

CORPORATE RESTRICTED SECURITIES: (A) (Continued)	Percentage -----	Date -----
POWER SERVICES HOLDING COMPANY		
A provider of industrial motor repair services, predictive and preventative maintenance, and performing the petrochemical, mining, power generation, metals, and paper industries.		
12% Senior Subordinated Note due 2016	\$ 1,255,814	02/11/08
Limited Partnership Interest (B)	12.55% int.	02/11/08
Warrant, exercisable until 2016, to purchase common stock at \$.01 per share (B)	700 shs.	02/11/08
PRECISION WIRE HOLDING COMPANY		
A manufacturer of specialty medical wires that are used in non-elective minimally invasive surgical procedures.		
14.25% Senior Subordinated Note due 2016	\$ 1,357,886	11/12/09
Warrant, exercisable until 2019, to purchase common stock at \$.01 per share (B)	109 shs.	11/12/09
QUALIS AUTOMOTIVE LLC		
A distributor of aftermarket automotive brake and chassis products.		
13% Senior Subordinated Note due 2012	\$ 922,612	05/28/04
Common Stock (B)	187,500 shs.	05/28/04
Warrant, exercisable until 2012, to purchase common stock at \$.01 per share (B)	199,969 shs.	05/28/04
RAJ MANUFACTURING HOLDINGS LLC		
A designer and manufacturer of women's swimwear sold under a variety of licensed brand names.		
14.5% Senior Subordinated Note due 2014	\$ 1,288,627	12/15/06
Limited Liability Company Unit (B)	1,497 uts.	12/15/06
Warrant, exercisable until 2014, to purchase common stock at \$.01 per share (B)	2 shs.	12/15/06
R E I DELAWARE HOLDING, INC.		
An engineer and manufacturer of highly complex, close tolerance components, assemblies, tooling and equipment primarily for aerospace, medical and defense/radar markets.		
12% Senior Subordinated Note due 2016	\$ 1,350,000	01/18/08
Warrant, exercisable until 2018, to purchase common stock at \$.01 per share (B)	3 shs.	01/18/08
ROYAL BATHS MANUFACTURING COMPANY		
A manufacturer and distributor of acrylic and cultured marble bathroom products.		
12.5% Senior Subordinated Note due 2011	\$ 562,500	11/14/03
Warrant, exercisable until 2011, to purchase common stock at \$.01 per share (B)	74 shs.	11/14/03

CONSOLIDATED SCHEDULE OF INVESTMENTS (CONTINUED)

Edgar Filing: MASSMUTUAL PARTICIPATION INVESTORS - Form N-Q

March 31, 2010

(Unaudited)

CORPORATE RESTRICTED SECURITIES: (A) (Continued)	Principal Amount Shares, Units or Ownership Percentage -----	Acquisition Date -----
SAFETY SPEED CUT MANUFACTURING COMPANY, INC. A manufacturer of vertical panel saws and routers for the wood working industry. Class B Common Stock (B)		
	846 shs.	06/02/99
SAVAGE SPORTS HOLDING, INC. A manufacturer of sporting firearms. 12% Senior Subordinated Note due 2012 Common Stock (B)		
	\$ 814,655 324 shs.	09/10/04 *
Warrant, exercisable until 2012, to purchase common stock at \$.01 per share (B)		
	71 shs.	09/10/04
* 09/10/04 and 10/05/07.		
SENCORE HOLDING COMPANY A designer, manufacturer, and marketer of decoders, receivers and modulators sold to broadcasters operators for encoding/decoding analog and digital transmission video signals. 12.5% Senior Subordinated Note due 2014 Common Stock (B)		
	\$ 934,615 69 shs.	01/15/09 01/15/09
Warrant, exercisable until 2019, to purchase common stock at \$.01 per share (B)		
	149 shs.	01/15/09
SMART SOURCE HOLDINGS LLC A short-term computer rental company. 12% Senior Subordinated Note due 2015 Limited Liability Company Unit (B)		
	\$ 1,176,924 328 uts.	* *
Warrant, exercisable until 2015, to purchase common stock at \$.01 per share (B)		
	83 shs.	*
* 08/31/07 and 03/06/08.		
SPARTAN FOODS HOLDING COMPANY A manufacturer of branded pizza crusts and pancakes. 12.5% Senior Subordinated Note due 2017 Warrant, exercisable until 2018, to purchase common stock at \$.01 per share (B)		
	\$ 1,012,500 136 shs.	12/15/09 12/15/09
SPECIALTY COMMODITIES, INC. A distributor of specialty food ingredients. 13.25% Senior Subordinated Note due 2016 Common Stock (B)		
	\$ 1,212,720 15,882 shs.	10/23/08 10/23/08
Warrant, exercisable until 2018, to purchase common stock at \$.01 per share (B)		
	5,852 shs.	10/23/08

Edgar Filing: MASSMUTUAL PARTICIPATION INVESTORS - Form N-Q

MassMutual Participation Investors

CONSOLIDATED SCHEDULE OF INVESTMENTS (CONTINUED)

March 31, 2010

(Unaudited)

CORPORATE RESTRICTED SECURITIES: (A) (Continued)	Principal Amount Shares, Units or Ownership Percentage -----	Acquisition Date -----
STANTON CARPET HOLDING CO.		
A designer and marketer of high and mid-priced decorative carpets and rugs.		
12.13% Senior Subordinated Note due 2014	\$ 1,185,366	08/01/06
Common Stock (B)	165 shs.	08/01/06
Warrant, exercisable until 2014, to purchase common stock at \$.02 per share (B)	55 shs.	08/01/06
SUNDANCE INVESTCO LLC		
A provider of post-production services to producers of movies and television shows.		
Limited Liability Company Unit Class A	3,405 shs.	03/31/10
SYNTERACT HOLDINGS CORPORATION		
A provider of outsourced clinical trial management services to pharmaceutical and biotechnology companies.		
4% Senior Subordinated Note due 2016	\$ 1,371,709	09/02/08
Redeemable Preferred Stock Series A (B)	678 shs.	09/02/08
Warrant, exercisable until 2018, to purchase common stock at \$.01 per share (B)	6,778 shs.	09/02/08
T H I ACQUISITION, INC.		
A machine servicing company providing value-added steel services to long steel products.		
12% Senior Subordinated Note due 2016	\$ 1,350,000	01/14/08
Warrant, exercisable until 2016, to purchase common stock at \$.01 per share (B)	5 shs.	01/14/08
TANGENT RAIL CORPORATION		
A manufacturer of rail ties and provider of specialty services to the North American railroad industry.		
13% Senior Subordinated Note due 2015	\$ 1,173,909	10/14/05
Common Stock (B)	1,167 shs.	10/14/05
Warrant, exercisable until 2015, to purchase common stock at \$.01 per share (B)	631 shs.	09/30/08
TELECORPS HOLDINGS, INC.		
A provider of equipment and services to producers of television shows and motion pictures.		
12.75% Senior Subordinated Note due 2016	\$ 1,681,677	*
Common Stock (B)	143 shs.	09/02/09
Warrant, exercisable until 2019, to purchase common stock at \$.01 per share (B)	4,187 shs.	*

* 05/20/09 and 09/02/09.

Edgar Filing: MASSMUTUAL PARTICIPATION INVESTORS - Form N-Q

CONSOLIDATED SCHEDULE OF INVESTMENTS (CONTINUED)
 March 31, 2010
 (Unaudited)

CORPORATE RESTRICTED SECURITIES: (A) (Continued)	Principal Amount Shares, Units or Ownership Percentage -----	Acquisition Date -----
TERRA RENEWAL LLC		
A provider of wastewater residual management and required environmental reporting, permitting, and record keeping to companies involved in poultry and food processing.		
12% Senior Subordinated Note due 2014	\$ 664,062	*
6.79% Term Note due 2012 (C)	\$ 781,483	*
8.75% Term Note due 2012 (C)	\$ 826	*
Limited Partnership Interest of		
Saw Mill Capital Fund V, LLC (B)	2.27% int.	**
Warrant, exercisable until 2016, to purchase common stock at \$.01 per share (B)	41 shs.	04/28/06
* 04/28/06 and 09/13/06. ** 03/01/05 and 10/10/08.		
TORRENT GROUP HOLDINGS, INC.		
A contractor specializing in the sales and installation of engineered drywells for the retention of nuisance water flow.		
12.5% Senior Subordinated Note due 2013 (D)	\$ 1,185,366	10/26/07
Series A Preferred Stock (B)	219 shs.	10/26/07
TOTAL E & S, INC.		
A manufacturer of a wide variety of equipment used in the oil and gas industry.		
10.5% Senior Secured Term Note due 2013	\$ 486,487	03/02/07
13% Senior Subordinated Note due 2014 (D)	\$ 341,971	03/02/07
TRANSPAC HOLDING COMPANY		
A designer, importer, and wholesaler of home decor and seasonal gift products.		
12% Senior Subordinated Note due 2015 (D)	\$ 938,651	10/31/07
Common Stock (B)	110 shs.	10/31/07
Warrant, exercisable until 2015, to purchase common stock at \$.01 per share (B)	50 shs.	10/31/07
TRANSTAR HOLDING COMPANY		
A distributor of aftermarket automotive transmission parts.		
12% Senior Subordinated Note due 2014	\$ 918,000	08/31/05
Common Stock (B)	571 shs.	*
Warrant, exercisable until 2013, to purchase common stock at \$.02 per share (B)	46 shs.	08/31/05
* 08/31/05 and 04/30/07.		

Edgar Filing: MASSMUTUAL PARTICIPATION INVESTORS - Form N-Q

MassMutual Participation Investors

CONSOLIDATED SCHEDULE OF INVESTMENTS (CONTINUED)

March 31, 2010

(Unaudited)

CORPORATE RESTRICTED SECURITIES: (A) (Continued)	Principal Amount Shares, Units or Ownership Percentage -----	Acquisition Date -----
TRANZONIC COMPANIES (THE)		
A producer of commercial and industrial supplies, such as safety products, janitorial supplies, w supplies and sanitary care products.		
13% Senior Subordinated Note due 2010	\$ 1,356,000	02/05/98
Common Stock (B)	315 shs.	02/04/98
Warrant, exercisable until 2010, to purchase common stock at \$.01 per share (B)	222 shs.	02/05/98
TRUCK BODIES & EQUIPMENT INTERNATIONAL		
A designer and manufacturer of accessories for heavy and medium duty trucks, primarily dump bodie bodies, landscape bodies and other accessories.		
16% Senior Subordinated Note due 2010 (D)	\$ 1,222,698	*
Preferred Stock Series B (B)	128 shs.	10/20/08
Common Stock (B)	393 shs.	*
Warrant, exercisable until 2013, to purchase common stock at \$.02 per share (B)	81 shs.	*
Warrant, exercisable until 2018, to purchase common stock at \$.01 per share (B)	558 shs.	10/20/08
* 07/19/05 and 12/22/05.		
TRUSTILE DOORS, INC.		
A manufacturer and distributor of interior doors.		
Warrant, exercisable until 2010, to purchase common stock at \$.01 per share (B)	3,060 shs.	04/11/03
U M A ENTERPRISES, INC.		
An importer and wholesaler of home decor products.		
15% Senior Subordinated Note due 2015	\$ 938,797	02/08/08
Convertible Preferred Stock (B)	470 shs.	02/08/08
U-LINE CORPORATION		
A manufacturer of high-end, built-in, undercounter ice making, wine storage and refrigeration app		
14.5% Senior Subordinated Note due 2012	\$ 996,500	04/30/04
14.5% PIK Note due 2012	\$ 139,125	10/06/09
Common Stock (B)	96 shs.	04/30/04
Warrant, exercisable until 2012, to purchase common stock at \$.01 per share (B)	122 shs.	04/30/04

Edgar Filing: MASSMUTUAL PARTICIPATION INVESTORS - Form N-Q

MassMutual Participation Investors

CONSOLIDATED SCHEDULE OF INVESTMENTS (CONTINUED)

March 31, 2010

(Unaudited)

CORPORATE RESTRICTED SECURITIES: (A) (Continued)	Principal Amount Shares, Units or Ownership Percentage -----	Acquisition Date -----
VISIONEERING, INC.		
A designer and manufacturer of tooling and fixtures for the aerospace industry.		
10.5% Senior Secured Term Loan due 2013	\$ 458,824	05/17/07
13% Senior Subordinated Note due 2014	\$ 370,588	05/17/07
18% PIK Convertible Preferred Stock (B)	21,361 shs.	03/13/09
Common Stock (B)	70,588 shs.	05/17/07
Warrant, exercisable until 2014, to purchase common stock at \$.01 per share (B)	20,003 shs.	05/17/07
VITEX PACKAGING GROUP, INC.		
A manufacturer of specialty packaging, primarily envelopes and tags used on tea bags.		
10% Senior Subordinated PIK Note due 2011 (D)	\$ 85,308	07/19/04
5% Senior Subordinated PIK Note due 2011 (D)	\$ 450,000	06/30/07
Class B Unit (B)	406,525 uts.	10/29/09
Class C Unit (B)	450,000 uts.	10/29/09
Limited Liability Company Unit Class A (B)	383,011 uts.	*
Limited Liability Company Unit Class B (B)	96,848 uts.	07/19/04
* 07/19/04 and 10/29/09.		
WAGGIN' TRAIN HOLDINGS LLC		
A producer of premium quality meat dog treats.		
14% Senior Subordinated Note due 2014	\$ 1,180,960	11/15/07
Limited Liability Company Unit Class B (B)	224 uts.	11/15/07
Limited Liability Company Unit Class C (B)	224 uts.	11/15/07
WALLS INDUSTRIES, INC.		
A provider of branded workwear and sporting goods apparel.		
Limited Partnership Interest (B)	0.20% int.	07/12/04
Common Stock (B)	2,133 shs.	12/21/07
WELLBORN FOREST HOLDING CO.		
A manufacturer of semi-custom kitchen and bath cabinetry.		
14.13% Senior Subordinated Note due 2014	\$ 911,250	11/30/06
Common Stock (B)	101 shs.	11/30/06
Warrant, exercisable until 2014, to purchase common stock at \$.01 per share (B)	51 shs.	11/30/06

Edgar Filing: MASSMUTUAL PARTICIPATION INVESTORS - Form N-Q

MassMutual Participation Investors

CONSOLIDATED SCHEDULE OF INVESTMENTS (CONTINUED)

March 31, 2010

(Unaudited)

CORPORATE RESTRICTED SECURITIES: (A) (Continued)	Principal Amount Shares, Units or Ownership Percentage -----	Acquisition Date -----
WORKPLACE MEDIA HOLDING CO.		
A direct marketer specializing in providing advertisers with access to consumers in the workplace		
13% Senior Subordinated Note due 2015	\$ 613,692	05/14/07
Limited Partnership Interest (B)	12.26% int.	05/14/07
Warrant, exercisable until 2015, to purchase common stock at \$.02 per share (B)	47 shs.	05/14/07
XALOY SUPERIOR HOLDINGS, INC.		
A provider of melt processing components and ancillary equipment for both plastic injection molding		
15.5% Senior Subordinated Note due 2015 (D)	\$ 1,229,741	09/08/08
Common Stock (B)	150 shs.	09/08/08

TOTAL PRIVATE PLACEMENT INVESTMENTS (E)

CONSOLIDATED SCHEDULE OF INVESTMENTS (CONTINUED)

March 31, 2010

(Unaudited)

CORPORATE RESTRICTED SECURITIES: (A) (Continued)	Interest Rate -----	Due Date -----	Shares or Principal Amount -----	Cost -----
RULE 144A SECURITIES - 3.76%:				
BONDS - 3.76%				
ACCO Brands Corporation	10.625%	03/15/15	\$ 45,000	\$ 44,36
Advanced Micro Devices, Inc.	8.125	12/15/17	190,000	180,51
Appleton Papers, Inc.	11.250	12/15/15	252,000	250,00
Avis Budget Car Rental LLC	9.625	03/15/18	40,000	39,45
Cenveo Corporation	10.500	08/15/16	45,000	45,00
Coffeyville Resources LLC	9.000	04/01/15	70,000	69,65

Edgar Filing: MASSMUTUAL PARTICIPATION INVESTORS - Form N-Q

Compucom Systems, Inc.	12.500	10/01/15	670,000	651,90
CONSOL Energy, Inc.	8.250	04/01/20	15,000	15,00
Douglas Dynamics LLC	7.750	01/15/12	485,000	461,64
Eastman Kodak Co.	9.750	03/01/18	375,000	367,42
G F S I, Inc. (C)	10.500	06/01/11	358,000	343,94
Gannett Company, Inc.	9.375	11/15/17	60,000	59,14
Headwaters, Inc.	11.375	11/01/14	45,000	44,58
International Lease Finance Corporation	8.625	09/15/15	75,000	73,81
JohnsonDiversey, Inc.	8.250	11/15/19	45,000	44,62
L B I Escrow Corporation	8.000	11/01/17	100,000	100,00
New Communications Holdings, Inc.	8.250	04/15/17	500,000	500,00
Sealed Air Corporation	7.875	06/15/17	500,000	492,50
Sinclair Television Group, Inc.	9.250	11/01/17	200,000	194,72
T W Telecom Holdings, Inc.	8.000	03/01/18	10,000	9,92
ViaSystems, Inc.	12.000	01/15/15	100,000	96,45
TOTAL BONDS				4,084,68
CONVERTIBLE PREFERRED STOCK - 0.00%				
ETEX Corporation (B)			194	17
TOTAL CONVERTIBLE PREFERRED STOCK				17
PREFERRED STOCK - 0.00%				
TherOX, Inc. (B)			26	1,03
TOTAL PREFERRED STOCK				1,03
COMMON STOCK - 0.00%				
Touchstone Health Partnership (B)			292	1,06
TOTAL COMMON STOCK				1,06
TOTAL RULE 144A SECURITIES				4,086,96
TOTAL CORPORATE RESTRICTED SECURITIES				\$119,820,41

28

MassMutual Participation Investors

CONSOLIDATED SCHEDULE OF INVESTMENTS (CONTINUED)

March 31, 2010

(Unaudited)

CORPORATE PUBLIC SECURITIES - 15.19%: (A)	Interest Rate	Due Date	Principal Amount	Cost
	-----	-----	-----	-----
BONDS - 14.62%				
Affinia Group, Inc.	9.000%	11/30/14	\$ 25,000	\$ 24,25
Allegheny Technologies, Inc.	9.375	06/12/19	500,000	521,41
Allied Waste NA	7.125	05/15/16	500,000	506,23
American General Finance Corporation	6.500	09/15/17	250,000	215,00
C R H America, Inc.	5.300	10/15/13	500,000	418,43

Edgar Filing: MASSMUTUAL PARTICIPATION INVESTORS - Form N-Q

Centurytel, Inc.	5.000	02/15/15	500,000	516,35
Citigroup, Inc.	5.500	04/11/13	500,000	437,89
Cytec Industries, Inc.	8.950	07/01/17	600,000	603,88
Equifax, Inc.	4.450	12/01/14	500,000	518,26
Exide Corporation	10.500	03/15/13	250,000	252,68
Gencorp, Inc.	9.500	08/15/13	130,000	130,00
General Electric Capital Corporation	5.500	01/08/20	500,000	498,05
Goldman Sachs Group, Inc.	4.750	07/15/13	500,000	418,64
Goodyear Tire & Rubber Co.	10.500	05/15/16	50,000	48,10
Intelsat Jackson Holdings	9.250	06/15/16	690,000	714,19
International Game Technology	7.500	06/15/19	500,000	499,72
International Lease Finance Corporation	5.875	05/01/13	500,000	448,18
Iron Mountain, Inc.	8.750	07/15/18	500,000	512,61
Johnson Controls, Inc.	5.500	01/15/16	500,000	398,12
Manitowoc Company, Inc.	7.125	11/01/13	100,000	100,00
Markwest Energy Operating Co.	6.875	11/01/14	35,000	27,78
Masco Corporation	7.125	03/15/20	350,000	349,99
Morgan Stanley	5.500	01/26/20	500,000	497,30
Nortek, Inc.	11.000	12/01/13	100,444	98,95
Owens Corning, Inc.	9.000	06/15/19	30,000	29,51
Qwest Diagnostic, Inc.	4.750	01/30/20	500,000	498,66
Rental Service Corporation	9.500	12/01/14	175,000	175,67
Sheridan Acquisition Corporation	10.250	08/15/11	225,000	222,00
Speedway Motorsports, Inc.	8.750	06/01/16	35,000	33,94
Sprint Capital Corporation	6.900	05/01/19	440,000	405,22
Stewart & Stevenson LLC	10.000	07/15/14	735,000	754,88
Teck Resources Ltd.	10.750	05/15/19	30,000	28,55
Texas Industries, Inc.	7.250	07/15/13	35,000	35,00
The Valspar Corporation	7.250	06/15/19	500,000	501,46
Ticketmaster Entertainment, Inc.	10.750	07/28/16	250,000	250,00
Time Warner Cable, Inc.	5.000	02/01/20	500,000	489,79
Titan International, Inc.	8.000	01/15/12	70,000	70,00
Tube City IMS Corporation	9.750	02/01/15	1,000,000	989,44

CONSOLIDATED SCHEDULE OF INVESTMENTS (CONTINUED)
 March 31, 2010
 (Unaudited)

CORPORATE PUBLIC SECURITIES: (A) (Continued)	Interest Rate	Due Date	Shares or Principal Amount	Cost
	-----	-----	-----	-----
Tyco International Group SA	8.500%	01/15/19	\$ 500,000	\$ 457,49
Tyco International Group SA	6.550	10/01/17	125,000	124,99
United Components, Inc.	9.375	06/15/13	535,000	535,26
Verso Paper Holdings LLC	9.125	08/01/14	500,000	486,87
W P P Finance Corporation	5.875	06/15/14	500,000	508,09
TOTAL BONDS				15,353,00
COMMON STOCK - 0.56%				
CKX, Inc. (B)			52,500	422,62
Directed Electronics, Inc. (B)			195,118	982,86
ITC^DeltaCom, Inc. (B)			94,588	827,64
Intrepid Potash, Inc. (B)			185	5,92

Edgar Filing: MASSMUTUAL PARTICIPATION INVESTORS - Form N-Q

Nortek, Inc. (B)				100	
Rue21, Inc. (B)				350	6,65
TOTAL COMMON STOCK					2,245,70

CONVERTIBLE BONDS - 0.01%					
Citadel Broadcasting Corporation	4.000%	02/15/11	\$	250,000	194,06
TOTAL CONVERTIBLE BONDS					194,06
TOTAL CORPORATE PUBLIC SECURITIES					\$ 17,792,78

SHORT-TERM SECURITIES:	Interest Rate/Yield [^]	Due Date		Principal Amount	Cost

COMMERCIAL PAPER - 1.97%					
Sabmiller PLC	0.270%	04/05/10	\$	2,200,000	2,199,93
TOTAL SHORT-TERM SECURITIES					2,199,93

TOTAL INVESTMENTS	108.43%				\$139,813,13
=====					
Other Assets	4.62				
Liabilities	(13.05)				

TOTAL NET ASSETS	100.00%				=====

- (A) In each of the convertible note, warrant, and common stock investments, the issuer has agreed certain registration rights.
- (B) Non-income producing security.
- (C) Variable rate security; rate indicated is as of 03/31/10.
- (D) Defaulted security; interest not accrued.
- (E) Illiquid security. As of March 31, 2010, the values of these securities amounted to \$97,697, of net assets.
- [^] Effective yield at purchase
- PIK - Payment-in-kind

30

MassMutual Participation Investors
 CONSOLIDATED SCHEDULE OF INVESTMENTS (CONTINUED)
 March 31, 2010
 (Unaudited)

INDUSTRY CLASSIFICATION:	Fair Value/ Market Value	

AEROSPACE - 4.33%		BUILDINGS & REAL ESTATE -
A E Company, Inc.	\$ 1,794,703	K W P I Holdings Corporati
Gencorp, Inc.	132,113	Masco Corporation
P A S Holdco LLC	2,072,752	Owens Corning, Inc.
Visioneering, Inc.	837,803	Texas Industries, Inc.
	-----	TruStile Doors, Inc.

Edgar Filing: MASSMUTUAL PARTICIPATION INVESTORS - Form N-Q

	4,837,371	

AUTOMOBILE - 4.63%		
Exide Corporation	253,750	CHEMICAL, PLASTICS & RUBBER
Goodyear Tire & Rubber Co.	54,000	Capital Specialty Plastics
Jason, Inc.	25,509	
Johnson Controls, Inc.	535,334	CONSUMER PRODUCTS - 9.61%
Nyloncraft, Inc.	348,215	Aero Holdings, Inc.
Ontario Drive & Gear Ltd.	287,141	Bravo Sports Holding Corpo
Qualis Automotive LLC	1,362,815	Custom Engineered Wheels,
Titan International, Inc.	70,000	Eastman Kodak Co.
Transtar Holding Company	1,693,931	G F S I, Inc.
United Components, Inc.	537,675	JohnsonDiversey, Inc.
	-----	K N B Holdings Corporation
	5,168,370	Manhattan Beachwear Holdin
	-----	Momentum Holding Co.
BEVERAGE, DRUG & FOOD - 8.51%		R A J Manufacturing Holding
Eatem Holding Company	992,395	Royal Baths Manufacturing
Golden County Foods Holding, Inc.	1,102,304	The Tranzonic Companies
Hospitality Mints Holding Company	1,109,473	Walls Industries, Inc.
L H D Europe Holding, Inc.	12,825	
Sabmiller PLC	2,199,934	CONTAINERS, PACKAGING & GL
Spartan Foods Holding Company	1,013,990	Flutes, Inc.
Specialty Commodities, Inc.	1,380,803	Maverick Acquisition Compa
Waggin' Train Holdings LLC	1,682,469	P I I Holding Corporation
	-----	Paradigm Packaging, Inc.
	9,494,193	Sealed Air Corporation
	-----	Vitex Packaging Group, Inc
BROADCASTING & ENTERTAINMENT - 1.95%		
Citadel Broadcasting Corporation	13,750	
CKX, Inc.	321,825	
Sinclair Television Group, Inc.	211,000	
Speedway Motorsports, Inc.	37,275	
Time Warner Cable, Inc.	492,991	DISTRIBUTION - 1.92%
WPP Finance Corporation	528,698	Duncan Systems, Inc.
Workplace Media Holding Co.	569,242	F C X Holdings Corporation

	2,174,781	

CONSOLIDATED SCHEDULE OF INVESTMENTS (CONTINUED)
 March 31, 2010
 (Unaudited)

INDUSTRY CLASSIFICATION: (Continued)	Fair Value/ Market Value	

DIVERSIFIED/CONGLOMERATE, MANUFACTURING - 8.18%		ELECTRONICS - 0.53%
A H C Holdings Company, Inc.	\$ 1,499,664	Connecticut Electric, Inc.
Arrow Tru-Line Holdings, Inc.	803,977	Directed Electronics, Inc.
C D N T, Inc.	776,186	
Douglas Dynamics LLC	489,850	FINANCIAL SERVICES - 2.62%
Headwaters, Inc.	46,969	American General Finance C
K P I Holdings, Inc.	836,413	Citigroup, Inc.
MEGTEC Holdings, Inc.	1,093,163	General Electric Capital C
Milwaukee Gear Company	1,121,539	

Edgar Filing: MASSMUTUAL PARTICIPATION INVESTORS - Form N-Q

Nortek, Inc.	111,726	Goldman Sachs Group, Inc.
Northwest Mailing Services, Inc.	1,391,230	Highgate Capital LLC
Postle Aluminum Company LLC	36,049	International Lease Financ
Truck Bodies & Equipment International	305,675	L B I Escrow Corporation
Xaloy Superior Holdings, Inc.	614,870	Morgan Stanley

	9,127,311	

DIVERSIFIED/CONGLOMERATE, SERVICE - 12.28%		HEALTHCARE, EDUCATION & CH
A S C Group, Inc.	1,357,838	American Hospice Managemen
A W X Holdings Corporation	766,284	F H S Holdings LLC
ACCO Brands Corporation	49,163	Qwest Diagnostic, Inc.
Advanced Technologies Holdings	1,326,341	Synteract Holdings Corpora
Affinia Group, Inc.	24,875	Touchstone Health Partners
Apex Analytix Holding Corporation	1,042,898	
C R H America, Inc.	532,601	
Clough, Harbour and Associates	1,438,990	
Crane Rental Corporation	1,303,064	HOME & OFFICE FURNISHINGS,
Diversco, Inc./DHI Holdings, Inc.	1,041,010	AND DURABLE CONSUMER PRODU
Dwyer Group, Inc.	796,772	Connor Sport Court Interna
Equifax, Inc.	513,187	H M Holding Company
Insurance Claims Management, Inc.	120,459	Home Decor Holding Company
Iron Mountain, Inc.	523,750	Justrite Manufacturing Acq
Mail Communications Group, Inc.	713,135	K H O F Holdings, Inc.
Nesco Holdings Corporation	1,451,784	Monessen Holding Corporati
Pearlman Enterprises, Inc.	--	Stanton Carpet Holding Co.
Tyco International Group	704,990	Transpac Holdings Company
	-----	U M A Enterprises, Inc.
	13,707,141	U-Line Corporation
	-----	Wellborn Forest Holding Co

32

MassMutual Participation Investors

CONSOLIDATED SCHEDULE OF INVESTMENTS (CONTINUED)
March 31, 2010
(Unaudited)

INDUSTRY CLASSIFICATION: (Continued)	Fair Value/ Market Value	

LEISURE, AMUSEMENT, ENTERTAINMENT - 2.09%		NATURAL RESOURCES - 1.86%
International Game Technology	\$ 566,320	Appleton Papers, Inc.
Savage Sports Holding, Inc.	1,486,462	Conveo Corporation
Ticketmaster Entertainment, Inc.	278,750	CONSOL Energy, Inc.
	-----	Cytec Industries, Inc.
	2,331,532	Intrepid Potash, Inc.
	-----	The Valspar Corporation
		Verso Paper Holdings LLC
MACHINERY - 9.20%		
A S A P Industries LLC	661,876	
Davis-Standard LLC	1,426,938	
E S P Holdco, Inc.	1,173,024	
K-Tek Holdings Corporation	1,464,208	OIL & GAS - 1.84%
M V I Holding, Inc.	625,998	Coffeyville Resources LLC
Manitowoc Company, Inc.	99,750	International Offshore Ser
Navis Global	103,884	Total E & S, Inc.

Edgar Filing: MASSMUTUAL PARTICIPATION INVESTORS - Form N-Q

NetShape Technologies, Inc.	628,341	
Pacific Consolidated Holdings LLC	612,732	
Power Services Holding Company	1,261,197	
R E I Delaware Holding, Inc.	1,368,009	PHARMACEUTICALS - 1.31%
Safety Speed Cut Manufacturing Company, Inc.	141,337	CorePharma LLC
Stewart & Stevenson LLC	707,434	

	10,274,728	

MEDICAL DEVICES/BIOTECH - 4.30%		PUBLISHING/PRINTING - 0.26%
Coeur, Inc.	723,765	Gannett Company, Inc.
E X C Acquisition Corporation	103,878	Sheridan Acquisition Corpo
ETEX Corporation	--	
MedSystems Holdings LLC	766,157	
MicroGroup, Inc.	1,208,526	RETAIL STORES - 0.27%
OakRiver Technology, Inc.	634,819	Olympic Sales, Inc.
Precision Wire Holding Company	1,358,456	Rental Service Corporation
TherOX, Inc.	--	Rue21, Inc.

	4,795,601	

MINING, STEEL, IRON & NON-PRECIOUS METALS - 2.40%		TECHNOLOGY - 2.94%
Allegheny Technology, Inc.	581,761	Advanced Micro Devices, In
T H I Acquisition, Inc.	1,080,000	Compucom Systems, Inc.
Teck Resources, Ltd.	36,750	Sencore Holding Company
Tube City IMS Corporation	983,750	Smart Source Holdings LLC
	-----	ViaSystems, Inc.
	2,682,261	

MassMutual Participation Investors

CONSOLIDATED SCHEDULE OF INVESTMENTS (CONTINUED)

March 31, 2010

(Unaudited)

INDUSTRY CLASSIFICATION: (Continued)	Fair Value/ Market Value

TELECOMMUNICATIONS - 4.10%	
All Current Holding Company	\$ 656,282
Centurytel, Inc.	509,463
Intelsat Bermuda Ltd.	696,900
ITC^DeltaCom, Inc.	191,068
New Communications Holdings, Inc.	505,625
Spirit Capital Corporation	402,600
Sundance Investco LLC	--
T W Telecom Holdings, Inc.	10,175
Telecorps Holdings, Inc.	1,602,002

	4,574,115

TRANSPORTATION - 2.20%	
Avis Budget Car Rental LLC	41,800
NABCO, Inc.	165,441
Tangent Rail Corporation	2,252,542

Edgar Filing: MASSMUTUAL PARTICIPATION INVESTORS - Form N-Q

	2,459,783

UTILITIES - 0.03%	
Markwest Energy Operating Co.	\$ 34,300

WASTE MANAGEMENT / POLLUTION - 1.62%	
Allied Waste NA	543,125
Terra Renewal LLC	1,262,189
Torrent Group Holdings, Inc.	--

	1,805,314

Total Investments - 108.43%	\$ 121,051,693
	=====

See Notes to Consolidated Financial Statements

34

INCOME TAX INFORMATION

The aggregate cost of investments is substantially the same for financial reporting and federal income tax purposes as of March 31, 2010. The net unrealized depreciation of investments for financial reporting and federal tax purposes as of March 31, 2010 is \$18,761,439 and consists of \$ 10,198,296 appreciation and \$28,959,735 depreciation.

FAIR VALUE MEASUREMENTS

In accordance with the authoritative guidance on fair value measurements and disclosures under accounting principles generally accepted in the United States of America ("U.S. GAAP"), the Trust discloses the fair value of its investments in a hierarchy that prioritizes the inputs to valuation techniques used to measure the fair value. The hierarchy gives the highest priority to valuations based upon unadjusted quoted prices in active markets for identical assets or liabilities (level 1 measurement) and the lowest priority to valuations based upon unobservable inputs that are significant to the valuation (level 3 measurements). The guidance establishes three levels of the fair value hierarchy as follows:

- Level 1: quoted prices in active markets for identical securities
- Level 2: other significant observable inputs (including quoted prices for similar securities, interest rates, prepayment speeds, credit risk, etc.)
- Level 3: significant unobservable inputs (including the Trust's own assumptions in determining the fair value of investments)

The inputs and methodology used for valuing securities are not necessarily an indication of the risk associated with investing in those securities.

The following is a summary of the inputs used to value the Trust's net assets as of March 31, 2010:

ASSETS:	TOTAL	LEVEL 1	LEVEL 2	LEVEL 3

Restricted Securities				
Bonds	\$ 86,464,525	\$ --	\$ 4,202,113	\$82,262,412
Common Stock	7,822,943	--	--	7,822,943

Edgar Filing: MASSMUTUAL PARTICIPATION INVESTORS - Form N-Q

Preferred Stock	3,738,173	--	--	3,738,173
Partnerships and LLCs	3,873,762	--	--	3,873,762
Public Securities				
Bonds	16,329,914	--	16,329,914	--
Common Stock	622,441	618,441	4,000	--
Preferred Stock	--	--	--	--
Short-term Securities	2,199,934	--	2,199,934	--

Total	\$121,051,692	\$ 618,441	\$22,735,961	\$97,697,290

Following is a reconciliation of Level 3 assets for which significant unobservable inputs were used to determine fair value:

Assets:	Beginning balance at 12/31/2009	Total gains or losses (realized/ unrealized)	Purchases, sales, issuances & settlements (net)	Transfers in and/or out of Level 3

Restricted Securities				
Bonds	\$81,465,949	\$ (685,514)	\$1,937,878	\$ (455,900)
Common Stock	7,767,378	(313,762)	369,326	--
Preferred Stock	3,468,130	268,791	1,252	--
Partnerships and LLCs	3,536,247	323,084	14,431	--

	\$96,237,704	\$ (407,401)	\$2,322,887	\$ (455,900)

ITEM 2. CONTROLS AND PROCEDURES.

(a) The principal executive officer and principal financial officer of the Registrant evaluated the effectiveness of the Registrant's disclosure controls and procedures (as defined in Rule 30a-3(c) under the Investment Company Act of 1940 (the "Act") as of a date within 90 days of the filing date of this report and based on that evaluation have concluded that such disclosure controls and procedures are effective to provide reasonable assurance that material information required to be disclosed by the Registrant on Form N-Q is recorded, processed, summarized and reported within the time periods specified in the Securities and Exchange Commission's rules and forms.

(b) There were no changes in the Registrant's internal control over financial reporting (as defined in Rule 30a-3(d) under the Act) that occurred during the Registrant's last fiscal quarter that has materially affected, or are reasonably likely to materially affect, the Registrant's internal control over financial reporting.

ITEM 3. EXHIBITS.

Certifications pursuant to Rule 30a-2(a) under the Investment Company Act of 1940 (17 CFR 270.30a-2(a)) are attached hereto as an exhibit.

SIGNATURES

Pursuant to the requirements of the Securities Exchange Act of 1934 and the Investment Company Act of 1940, the Registrant has duly caused this report to be signed on its behalf by the undersigned, thereunto duly authorized.

Edgar Filing: MASSMUTUAL PARTICIPATION INVESTORS - Form N-Q

(Registrant) MassMutual Participation Investors

By (Signature and Title)* /s/ Michael L. Klofas

Michael L. Klofas, President

Date May 28, 2010

Pursuant to the requirements of the Securities Exchange Act of 1934 and the Investment Company Act of 1940, this report has been signed below by the following persons on behalf of the Registrant and in the capacities and on the dates indicated.

By (Signature and Title)* /s/ Michael L. Klofas

Michael L. Klofas, President

Date May 28, 2010

By (Signature and Title)* /s/ James M. Roy

James M. Roy, Vice President and
Chief Financial Officer

Date May 28, 2010

* PRINT THE NAME AND TITLE OF EACH SIGNING OFFICER UNDER HIS OR HER SIGNATURE.