

MASSMUTUAL PARTICIPATION INVESTORS

Form N-Q

November 29, 2010

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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, Secretary and Chief Legal Officer
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: 09/30/10

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CONSOLIDATED SCHEDULE OF INVESTMENTS
September 30, 2010

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(Unaudited)

| | Principal Amount Shares, Units or Ownership Percentage ----- | Acquisition Date ----- |
|---|--|------------------------------|
| CORPORATE RESTRICTED SECURITIES - 88.56%:(A) | | |
| PRIVATE PLACEMENT INVESTMENTS - 85.66% | | |
| A E COMPANY, INC. | | |
| A designer and manufacturer of machined parts and assembly structures for the commercial and military | | |
| 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 | \$ 1,342,450 | 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 (D) | \$ 420,000 | 05/15/08 |
| 13% Senior Subordinated Note due 2015 (D) | \$ 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 |

8

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September 30, 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 | \$ 1,172,906 | 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 |

CONSOLIDATED SCHEDULE OF INVESTMENTS (CONTINUED)
September 30, 2010
(Unaudited)

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| 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. | | |
| 12% 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 |
| ASSOCIATED DIVERSIFIED SERVICES | | |
| A provider of routine maintenance and repair services primarily to electric utility companies providing distribution lines. | | |
| 10% Senior Secured Term Note due 2016 (C) | \$ 323,700 | 09/30/10 |
| 13% Senior Subordinated Note due 2017 | \$ 296,180 | 09/30/10 |
| Limited Liability Company Unit Class B (B) | 36,000 uts. | 09/30/10 |
| Limited Liability Company Unit Class B OID (B) | 27,520 uts. | 09/30/10 |
| BARCODES GROUP, INC. | | |
| A distributor and reseller of automatic identification and data capture equipment, including mobile point-of-sale systems, labels, and accessories. | | |
| 13.5% Senior Subordinated Note due 2016 | \$ 638,651 | 07/27/10 |
| Preferred Stock (B) | 13 shs. | 07/27/10 |
| Common Stock Class A (B) | 44 shs. | 07/27/10 |
| Warrant, exercisable until 2020, to purchase common stock at \$.01 per share (B) | 8 shs. | 07/27/10 |
| 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 | \$ 377,112 | 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 |

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MassMutual Participation Investors

CONSOLIDATED SCHEDULE OF INVESTMENTS (CONTINUED)

September 30, 2010

(Unaudited)

| CORPORATE RESTRICTED SECURITIES: (A) (Continued) | Principal Amount Shares, Units or Ownership Percentage ----- | Acquisition Date ----- |
|---|--|------------------------------|
| | | |
| 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 |
| | | |
| 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. | | |
| 10% Senior Subordinated Note due 2014 (D) | \$ 771,051 | 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 |
| Limited Liability Company Unit Class D (B) | 671,525 uts. | 05/03/10 |
| Limited Liability Company Unit Class E (B) | 1,102 uts. | 05/03/10 |
| | | |
| 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) | 6.88% 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 |

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CONSOLIDATED SCHEDULE OF INVESTMENTS (CONTINUED)
 September 30, 2010
 (Unaudited)

| CORPORATE RESTRICTED SECURITIES: (A) (Continued) | Principal Amount Shares, Units or Ownership Percentage ----- | Acquisition Date ----- |
|--|--|------------------------------|
| 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 |
| 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 (B) | 156 shs. | 10/27/09 |
| Preferred Stock Series A (B) | 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 lab | | |
| Membership Interests of MM/Lincap | | |
| Diversco Investments Ltd. LLC (B) | 13.57% int. | 08/27/98 |
| 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.

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CONSOLIDATED SCHEDULE OF INVESTMENTS (CONTINUED)
 September 30, 2010
 (Unaudited)

| CORPORATE RESTRICTED SECURITIES: (A) (Continued) | Principal Amount Shares, Units or Ownership Percentage ----- | Acquisition Date ----- |
|--|--|------------------------------|
| | | |
| 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. | | |
| | | |
| E S P HOLDCO, INC. | | |
| A manufacturer of power protection technology for commercial office equipment, primarily supplying network. | | |
| 14% Senior Subordinated Note due 2015 | \$ 1,241,169 | 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 (B) | 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 | \$ 1,186,983 | 10/06/08 |
| Preferred Stock (B) | 2,298 shs. | 10/06/08 |
| Common Stock (B) | 1,625 shs. | 10/06/08 |

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CONSOLIDATED SCHEDULE OF INVESTMENTS (CONTINUED)
September 30, 2010
(Unaudited)

| CORPORATE RESTRICTED SECURITIES: (A) (Continued) | Principal Amount Shares, Units or Ownership Percentage ----- | Acquisition Date ----- |
|---|--|------------------------------|
| F F C HOLDING CORPORATION | | |
| A leading U.S. manufacturer of private label frozen novelty and ice cream products. | | |
| 16% Senior Subordinated Note due 2014 | \$ 829,268 | 09/27/10 |
| Limited Liability Company Units Preferred (B) | 171 uts. | 09/27/10 |
| Limited Liability Company Units (B) | 171 uts. | 09/27/10 |
| 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 p | | |
| 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 |
| 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 | \$ 250,259 | 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 |

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14

MassMutual Participation Investors

CONSOLIDATED SCHEDULE OF INVESTMENTS (CONTINUED)
September 30, 2010
(Unaudited)

| CORPORATE RESTRICTED SECURITIES: (A) (Continued) | Principal Amount Shares, Units or Ownership Percentage ----- | Acquisition Date ----- |
|---|--|------------------------------|
| 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 |
| 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 (D) | \$ 510,187 | 08/04/00 |
| Limited Partnership Interest of Saw Mill Capital Fund II, L.P. (B) | 1.30% int. | 08/03/00 |
| 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 |

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 CONSOLIDATED SCHEDULE OF INVESTMENTS (CONTINUED)
 September 30, 2010
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| CORPORATE RESTRICTED SECURITIES: (A) (Continued) | Principal Amount Shares, Units or Ownership Percentage ----- | Acquisition Date ----- |
|---|--|------------------------------|
| K H O F HOLDINGS, INC. | | |
| A manufacturer of premium disposable tableware products serving both the foodservice and consumer | | |
| 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 (D) | \$ 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 |
| K P I HOLDINGS, INC. | | |
| The largest player in the U.S. non-automotive, non-ferrous die casting segment. | | |
| 18% Senior Subordinated Note due 2014 (D) | \$ 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 (D) | \$ 1,555,404 | 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 |
| L H D EUROPE HOLDINGS, INC. | | |
| A non-carbonated beverage dispensing company focused on the foodservice industry. | | |
| Common Stock (B) | 45 shs. | 12/28/09 |

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CONSOLIDATED SCHEDULE OF INVESTMENTS (CONTINUED)

September 30, 2010

(Unaudited)

| | Principal Amount Shares, Units or Ownership Percentage ----- | Acquisition Date ----- |
|---|--|------------------------------|
| CORPORATE RESTRICTED SECURITIES: (A) (Continued) | | |
| M V I HOLDING, INC. | | |
| A manufacturer of large precision machined metal components used in equipment which services a va | | |
| the oil and gas, mining, and defense markets. | | |
| 13% Senior Subordinated Note due 2016 | \$ 656,154 | 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 |
| 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 2011 (C) | \$ 81,741 | 09/03/04 |
| 12.5% Senior Secured Tranche B Note due 2011 | \$ 179,104 | 09/03/04 |
| 6.79% Senior Secured Revolver due 2011 (C) | \$ 44,777 | 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 |
| MBWS ULTIMATE HOLDCO, INC. | | |
| A provider of services throughout North Dakota that address the fluid management and related tran | | |
| 12% Senior Subordinated Note due 2016 | \$ 883,721 | 09/07/10 |
| Preferred Stock Series A (B) | 1,388 shs. | 09/07/10 |
| Common Stock (B) | 153 shs. | 09/07/10 |
| Warrant, exercisable until 2016, to purchase common stock at \$.01 per share (B) | 386 shs. | 09/07/10 |

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CONSOLIDATED SCHEDULE OF INVESTMENTS (CONTINUED)
September 30, 2010
(Unaudited)

| CORPORATE RESTRICTED SECURITIES: (A) (Continued) | Principal Amount Shares, Units or Ownership Percentage ----- | Acquisition Date ----- |
|---|--|------------------------------|
| 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 | \$ 620,676 | 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 |
| 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 manufact | | |
| 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 architectu | | |
| 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 |

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18

MassMutual Participation Investors

CONSOLIDATED SCHEDULE OF INVESTMENTS (CONTINUED)
September 30, 2010
(Unaudited)

| CORPORATE RESTRICTED SECURITIES:(A) (Continued) | Principal Amount Shares, Units or Ownership Percentage ----- | Acquisition Date ----- |
|---|--|------------------------------|
| 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 (D) | \$ 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. | | |
| NAVIS GLOBAL | | |
| A designer, manufacturer, seller and servicer of finishing machinery for the knit and woven segments | | |
| 10.75% Senior Secured Note due 2011 (D) | \$ 397,479 | 05/28/04 |
| 14% Senior Subordinated Note due 2014 (D) | \$ 780,219 | 05/28/04 |
| NESCO HOLDINGS CORPORATION | | |
| A sales and leasing company that provides equipment to the electric utility, telecommunications, and other industries | | |
| 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 machinery | | |
| 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) | 65 uts. | 09/30/09 |
| Preferred Stock Class A (B) | 1 sh. | 12/18/08 |
| Preferred Stock Class A-1 (B) | 6 shs. | 09/30/09 |
| Warrant, exercisable until 2014, to purchase common stock at \$.01 per share (B) | 48 shs. | 02/02/07 |

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* 12/18/08 and 09/30/09.

 CONSOLIDATED SCHEDULE OF INVESTMENTS (CONTINUED)
 September 30, 2010
 (Unaudited)

| CORPORATE RESTRICTED SECURITIES: (A) (Continued) | Principal Amount Shares, Units or Ownership Percentage ----- | Acquisition Date ----- |
|--|--|------------------------------|
| 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 | \$ 1,492,105 | * |
| Limited Partnership Interest (B) | 1,724 uts. | * |
| Warrant, exercisable until 2019, to purchase common stock at \$.01 per share (B) | 2,605 shs. | * |
| * 07/09/09 and 08/09/10. | | |
| 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 |
| O E C HOLDING CORPORATION | | |
| A provider of elevator maintenance, repair and modernization services. | | |
| 13% Senior Subordinated Note due 2017 | \$ 444,445 | 06/04/10 |
| Preferred Stock Series A (B) | 554 shs. | 06/04/10 |
| Preferred Stock Series B (B) | 311 shs. | 06/04/10 |
| Common Stock (B) | 344 shs. | 06/04/10 |
| 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 | \$ 45,982 | 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 |

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20

MassMutual Participation Investors

CONSOLIDATED SCHEDULE OF INVESTMENTS (CONTINUED)
September 30, 2010
(Unaudited)

| CORPORATE RESTRICTED SECURITIES: (A) (Continued) | Principal Amount Shares, Units or Ownership Percentage ----- | Acquisition Date ----- |
|--|--|------------------------------|
| 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 | \$ 1,249,031 | 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 |
| 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 | \$ 719,041 | 04/27/07 |
| 5% Senior Subordinated Note due 2012 | \$ 42,187 | 07/21/10 |
| Preferred Shares Series E (B) | 42,187 shs. | 07/21/10 |
| Limited Liability Preferred Unit (B) | 928,962 uts. | 04/27/07 |
| PARADIGM PACKAGING, INC. | | |
| A manufacturer of plastic bottles and closures for the nutritional, pharmaceutical, personal care | | |
| 12% 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 |

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 CONSOLIDATED SCHEDULE OF INVESTMENTS (CONTINUED)
 September 30, 2010
 (Unaudited)

| CORPORATE RESTRICTED SECURITIES: (A) (Continued) | Principal Amount Shares, Units or Ownership Percentage ----- | Acquisition Date ----- |
|--|--|------------------------------|
| | | |
| PEARLMAN ENTERPRISES, INC. | | |
| A developer and distributor of tools, equipment and supplies to the natural and engineered stone | | |
| 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. | | |
| 15% Senior Subordinated Note due 2013 | \$ 817,979 | 06/03/10 |
| 3% Senior Subordinated PIK Note due 2014 (D) | \$ 1,209,017 | 10/02/06 |
| Limited Liability Company Unit Class A (B) | 733 uts. | 10/02/06 |
| Limited Liability Company Unit (B) | 76 uts. | 05/22/09 |
| Warrant, exercisable until 2016, to purchase common stock at \$.01 per share (B) | 4,550 shs. | 10/02/06 |
| | | |
| POWER SERVICES HOLDING COMPANY | | |
| A provider of industrial motor repair services, predictive and preventative maintenance, and performance serving 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 | | |
| 14.25% Senior Subordinated Note due 2016 | \$ 1,368,089 | 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 2013 | \$ 922,612 | 05/28/04 |
| Common Stock (B) | 187,500 shs. | 05/28/04 |
| Warrant, exercisable until 2014, to purchase common stock at \$.01 per share (B) | 199,969 shs. | 05/28/04 |

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22

MassMutual Participation Investors
 CONSOLIDATED SCHEDULE OF INVESTMENTS (CONTINUED)
 September 30, 2010
 (Unaudited)

| CORPORATE RESTRICTED SECURITIES: (A) (Continued) | Principal Amount Shares, Units or Ownership Percentage ----- | Acquisition Date ----- |
|--|--|------------------------------|
| R A J 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 | \$ 1,384,011 | 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 |
| SAFETY SPEED CUT MANUFACTURING COMPANY, INC. | | |
| A manufacturer of vertical panel saws and routers for the woodworking 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 | \$ 814,655 | 09/10/04 |
| Preferred Stock Series A (B) | 35,038 shs. | 05/28/10 |
| Common Stock (B) | 324 shs. | * |
| 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 and operators for encoding/decoding analog and digital transmission video signals. | | |
| 12.5% Senior Subordinated Note due 2014 | \$ 934,615 | 01/15/09 |
| Common Stock (B) | 69 shs. | 01/15/09 |

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Warrant, exercisable until 2019, to purchase
common stock at \$.01 per share (B) 149 shs. 01/15/09

CONSOLIDATED SCHEDULE OF INVESTMENTS (CONTINUED)
September 30, 2010
(Unaudited)

| CORPORATE RESTRICTED SECURITIES: (A) (Continued) | Principal Amount Shares, Units or Ownership Percentage ----- | Acquisition Date ----- |
|---|--|------------------------------|
| SMART SOURCE HOLDINGS LLC | | |
| A short-term computer rental company. | | |
| 12% Senior Subordinated Note due 2015 | \$ 1,176,924 | * |
| Limited Liability Company Unit (B) | 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. | | |
| 12.25% Senior Subordinated Note due 2017 | \$ 1,012,500 | 12/15/09 |
| Warrant, exercisable until 2018, to purchase common stock at \$.01 per share (B) | 136 shs. | 12/15/09 |
| SPECIALTY COMMODITIES, INC. | | |
| A distributor of specialty food ingredients. | | |
| 13.25% Senior Subordinated Note due 2016 | \$ 1,220,311 | 10/23/08 |
| Common Stock (B) | 15,882 shs. | 10/23/08 |
| Warrant, exercisable until 2018, to purchase common stock at \$.01 per share (B) | 5,852 shs. | 10/23/08 |
| 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 (B) | 3,405 shs. | 03/31/10 |
| SYNTERACT HOLDINGS CORPORATION | | |
| A provider of outsourced clinical trial management services to pharmaceutical and biotechnology c | | |
| 14.5% Senior Subordinated Note due 2016 | \$ 1,381,270 | 09/02/08 |

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| | | |
|---|------------|----------|
| 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 |

24

MassMutual Participation Investors

CONSOLIDATED SCHEDULE OF INVESTMENTS (CONTINUED)
September 30, 2010
(Unaudited)

| CORPORATE RESTRICTED SECURITIES: (A) (Continued) | Principal Amount Shares, Units or Ownership Percentage ----- | Acquisition Date ----- |
|---|--|------------------------------|
| 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 |
| 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. | | |
| TERRA RENEWAL LLC | | |
| A provider of wastewater residual management and required environmental reporting, permitting, nu 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) | \$ 779,834 | * |
| 8.75% Term Note due 2012 (C) | \$ 830 | * |
| 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 nuisance water flow. | | |
| 14.5% Senior Subordinated Note due 2013 (D) | \$ 1,185,366 | 10/26/07 |
| Series B Preferred Stock (B) | 97 shs. | 03/31/10 |
| Common Stock (B) | 273 shs. | 03/31/10 |
| TOTAL E & S, INC. | | |

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| | | |
|---|------------|----------|
| 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 |

CONSOLIDATED SCHEDULE OF INVESTMENTS (CONTINUED)
September 30, 2010
(Unaudited)

| | Principal Amount Shares, Units or Ownership Percentage | Acquisition Date |
|--|---|---------------------|
| CORPORATE RESTRICTED SECURITIES: (A) (Continued) | ----- | ----- |
| TRANSPAC HOLDING COMPANY | | |
| A designer, importer, and wholesaler of home decor and seasonal gift products. | | |
| 14% 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. | | |
| 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. | | |
| 8% Senior Subordinated Note due 2011 (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.

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TRUSTILE DOORS, INC.

A manufacturer and distributor of interior doors.

Warrant, exercisable until 2013, to purchase

common stock at \$.01 per share (B)

3,060 shs.

04/11/03

26

MassMutual Participation Investors

CONSOLIDATED SCHEDULE OF INVESTMENTS (CONTINUED)

September 30, 2010

(Unaudited)

| CORPORATE RESTRICTED SECURITIES: (A) (Continued) | Principal Amount Shares, Units or Ownership Percentage ----- | Acquisition Date ----- |
|---|--|------------------------------|
| | | |
| U M A ENTERPRISES, INC. | | |
| An importer and wholesaler of home decor products. | | |
| 15% Senior Subordinated Note due 2015 | \$ 952,932 | 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 | \$ 221,640 | 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 |
| | | |
| 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 | \$ 89,626 | 10/29/09 |
| 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.

WELLBORN FOREST HOLDING CO.

A manufacturer of semi-custom kitchen and bath cabinetry.

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| | | | |
|---|----|----------|----------|
| 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 |

MassMutual Participation Investors

CONSOLIDATED SCHEDULE OF INVESTMENTS (CONTINUED)

September 30, 2010

(Unaudited)

| | Principal Amount Shares, Units or Ownership Percentage | Acquisition Date |
|--|---|---------------------|
| CORPORATE RESTRICTED SECURITIES: (A) (Continued) | ----- | ----- |

WHEATON HOLDING CORPORATION

A distributor and manufacturer of laboratory supply products and packaging.

| | | |
|---------------------------------------|--------------|----------|
| 13% Senior Subordinated Note due 2017 | \$ 1,000,000 | 06/08/10 |
| Preferred Stock Series B (B) | 703 shs. | 06/08/10 |
| Common Stock (B) | 353 shs. | 06/08/10 |

WORKPLACE MEDIA HOLDING CO.

A direct marketer specializing in providing advertisers with access to consumers in the workplace

| | | |
|---|-------------|----------|
| 13% Senior Subordinated Note due 2015 (D) | \$ 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)

28

MassMutual Participation Investors

CONSOLIDATED SCHEDULE OF INVESTMENTS (CONTINUED)

September 30, 2010

(Unaudited)

| | | |
|----------|-----|------------------------|
| Interest | Due | Shares or Principal |
|----------|-----|------------------------|

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| CORPORATE RESTRICTED SECURITIES: (A) (Continued) | Rate | Date | Amount | Cost |
|--|---------|----------|------------|--------------|
| | ----- | ----- | ----- | ----- |
| RULE 144A SECURITIES - 2.90%: | | | | |
| BONDS - 2.90% | | | | |
| Appleton Papers, Inc. | 11.250% | 12/15/15 | \$ 252,000 | \$ 250,00 |
| ArcelorMittal | 6.125 | 06/01/18 | 500,000 | 519,17 |
| C C O Holdings LLC | 7.250 | 10/30/17 | 350,000 | 350,00 |
| Cenveo Corporation | 10.500 | 08/15/16 | 45,000 | 45,00 |
| Coffeyville Resources LLC | 9.000 | 04/01/15 | 70,000 | 69,65 |
| CompuCom Systems, Inc. | 12.500 | 10/01/15 | 670,000 | 653,06 |
| 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 |
| International Lease Finance Corporation | 8.625 | 09/15/15 | 75,000 | 73,89 |
| Lyondell Chemical Co. | 8.000 | 11/01/17 | 100,000 | 100,00 |
| Magnachip Semiconductor | 10.500 | 04/15/18 | 95,000 | 95,24 |
| NBC Universal | 5.150 | 04/30/20 | 500,000 | 499,29 |
| Sinclair Television Group, Inc. | 9.250 | 11/01/17 | 200,000 | 194,97 |
| ViaSystems, Inc. | 12.000 | 01/15/15 | 100,000 | 96,79 |
| TOTAL BONDS | | | | 3,350,18 |
| 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% | | | | |
| Nortek, Inc. (B) | | | 100 | |
| Touchstone Health Partnership (B) | | | 292 | 1,06 |
| TOTAL COMMON STOCK | | | | 1,06 |
| TOTAL RULE 144A SECURITIES | | | | 3,352,46 |
| TOTAL CORPORATE RESTRICTED SECURITIES | | | | \$118,558,14 |

CONSOLIDATED SCHEDULE OF INVESTMENTS (CONTINUED)
September 30, 2010
(Unaudited)

| CORPORATE PUBLIC SECURITIES - 15.81%: (A) | Interest Rate | Due Date | Principal Amount | Cost |
|---|---------------|----------|------------------|----------|
| | ----- | ----- | ----- | ----- |
| BONDS - 15.35% | | | | |
| ACCO Brands Corporation | 10.625% | 03/15/15 | \$ 45,000 | \$ 44,43 |
| Affinia Group, Inc. | 9.000 | 11/30/14 | 25,000 | 24,25 |

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| | | | | |
|---|--------|----------|---------|--------|
| Allegheny Technologies, Inc. | 9.375 | 06/12/19 | 500,000 | 520,62 |
| Allied Waste NA | 7.125 | 05/15/16 | 500,000 | 506,19 |
| 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 |
| Centurytel, Inc. | 5.000 | 02/15/15 | 500,000 | 514,81 |
| Citigroup, Inc. | 5.500 | 04/11/13 | 500,000 | 437,89 |
| Cytec Industries, Inc. | 8.250 | 11/15/19 | 600,000 | 603,67 |
| Diversey, Inc. | 8.950 | 07/01/17 | 45,000 | 44,62 |
| Equifax, Inc. | 4.450 | 12/01/14 | 500,000 | 516,46 |
| Exide Corporation | 10.500 | 03/15/13 | 250,000 | 252,24 |
| GATX Corporation | 4.750 | 05/15/15 | 500,000 | 512,61 |
| 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 | 48,21 |
| Headwaters, Inc. | 11.375 | 11/01/14 | 45,000 | 44,58 |
| Intelsat Bermuda Ltd. | 9.250 | 06/15/16 | 690,000 | 713,57 |
| 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 | 512,06 |
| J.C. Penney Company, Inc. | 7.950 | 04/01/17 | 500,000 | 554,73 |
| Johnson Controls, Inc. | 5.500 | 01/15/16 | 500,000 | 398,12 |
| Kraft Foods, Inc. | 5.375 | 02/10/20 | 500,000 | 516,70 |
| 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 |
| Pride International, Inc. | 6.875 | 08/15/20 | 30,000 | 30,00 |
| Qwest Diagnostic, Inc. | 4.750 | 01/30/20 | 500,000 | 498,66 |
| Rental Service Corporation | 9.500 | 12/01/14 | 175,000 | 175,61 |
| Sealed Air Corporation | 7.875 | 06/15/17 | 500,000 | 492,89 |
| Sheridan Acquisition Corporation | 10.250 | 08/15/11 | 225,000 | 222,00 |
| Sprint Capital Corporation | 6.900 | 05/01/19 | 440,000 | 405,22 |
| Teck Resources Ltd. | 10.750 | 05/15/19 | 30,000 | 28,60 |

30

MassMutual Participation Investors

CONSOLIDATED SCHEDULE OF INVESTMENTS (CONTINUED)

September 30, 2010

(Unaudited)

| CORPORATE PUBLIC SECURITIES: (A) (Continued) | Interest Rate | Due Date | Shares or Principal Amount | Cost |
|--|---------------|----------|----------------------------|-----------|
| The Valspar Corporation | 7.250% | 06/15/19 | \$ 500,000 | \$ 501,38 |
| 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 | 988,79 |
| 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 | 535,08 |
| 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 | 507,22 |

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| | | |
|-----------------------------------|---------|--------------|
| TOTAL BONDS | | 16,762,07 |
| <hr/> | | |
| COMMON STOCK - 0.46% | | |
| CKX, Inc. (B) | 52,500 | 422,62 |
| Directed Electronics, Inc. (B) | 195,118 | 982,86 |
| Intrepid Potash, Inc. (B) | 185 | 5,92 |
| ITC^DeltaCom, Inc. (B) | 94,588 | 827,64 |
| Rue21, Inc. (B) | 350 | 6,65 |
| <hr/> | | |
| TOTAL COMMON STOCK | | 2,245,70 |
| <hr/> | | |
| TOTAL CORPORATE PUBLIC SECURITIES | | \$ 19,007,78 |
| <hr/> | | |
| TOTAL INVESTMENTS | 104.37% | \$137,565,92 |
| <hr/> | | |
| Other Assets | 6.44 | |
| Liabilities | (10.81) | |
| <hr/> | | |
| TOTAL NET ASSETS | 100.00% | |
| <hr/> | | |

- (A) In each of the convertible note, warrant, convertible preferred and common stock investments, agreed to provide certain registration rights.
- (B) Non-income producing security.
- (C) Variable rate security; rate indicated is as of 09/30/10.
- (D) Defaulted security; interest not accrued.
- (E) Illiquid security. As of September 30, 2010, the value of these securities amounted to \$103,185.66% of net assets.
- PIK - Payment-in-kind

CONSOLIDATED SCHEDULE OF INVESTMENTS (CONTINUED)
September 30, 2010
(Unaudited)

| INDUSTRY CLASSIFICATION: | Fair Value/ Market Value | |
|----------------------------|-----------------------------|----------------------------|
| | ----- | |
| AEROSPACE - 4.40% | | BUILDINGS & REAL ESTATE - |
| A E Company, Inc. | \$ 1,846,976 | K W P I Holdings Corporati |
| Gencorp, Inc. | 132,275 | Masco Corporation |
| P A S Holdco LLC | 2,499,798 | Owens Corning, Inc. |
| Visioneering, Inc. | 821,479 | TruStile Doors, Inc. |
| | ----- | |
| | 5,300,528 | |
| | ----- | |
| AUTOMOBILE - 5.14% | | CHEMICAL, PLASTICS & RUBBE |
| Exide Corporation | 255,625 | Capital Specialty Plastics |
| Goodyear Tire & Rubber Co. | 56,625 | |
| Jason, Inc. | 25,509 | |
| Johnson Controls, Inc. | 566,589 | CONSUMER PRODUCTS - 9.88% |
| Nyloncraft, Inc. | 967,240 | Aero Holdings, Inc. |
| Ontario Drive & Gear Ltd. | 420,038 | Bravo Sports Holding Corpo |
| Qualis Automotive LLC | 1,452,629 | Custom Engineered Wheels, |
| Titan International, Inc. | 75,250 | G F S I, Inc. |

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| | | |
|--------------------------------------|-----------|-----------------------------|
| Transtar Holding Company | 1,823,498 | Johnson Diversey, Inc. |
| United Components, Inc. | 544,364 | K N B Holdings Corporation |
| | ----- | Manhattan Beachwear Holding |
| | 6,187,367 | Momentum Holding Co. |
| | ----- | R A J Manufacturing Holding |
| BEVERAGE, DRUG & FOOD - 6.09% | | Royal Baths Manufacturing |
| Eatem Holding Company | 1,023,022 | The Tranzonic Companies |
| F F C Holding Corporation | 990,096 | |
| Golden County Foods Holding, Inc. | 1,207,177 | |
| Hospitality Mints Holding Company | 1,119,209 | |
| Kraft Foods, Inc. | 556,576 | CONTAINERS, PACKAGING & GL |
| L H D Europe Holding, Inc. | 12,825 | Flutes, Inc. |
| Spartan Foods Holding Company | 1,022,078 | Maverick Acquisition Compa |
| Specialty Commodities, Inc. | 1,399,428 | P I I Holding Corporation |
| | ----- | Paradigm Packaging, Inc. |
| | 7,330,411 | Sealed Air Corporation |
| | ----- | Vitex Packaging Group, Inc |
| BROADCASTING & ENTERTAINMENT - 2.39% | | |
| C C O Holdings LLC | 354,813 | |
| CKX, Inc. | 257,250 | |
| NBC Universal | 536,407 | DISTRIBUTION - 1.81% |
| Sinclair Television Group, Inc. | 214,500 | Duncan Systems, Inc. |
| Time Warner Cable, Inc. | 535,463 | F C X Holdings Corporation |
| WPP Finance Corporation | 554,010 | |
| Workplace Media Holding Co. | 429,584 | |
| | ----- | |
| | 2,882,027 | |
| | ----- | |

32

MassMutual Participation Investors

CONSOLIDATED SCHEDULE OF INVESTMENTS (CONTINUED)

September 30, 2010

(Unaudited)

| INDUSTRY CLASSIFICATION: | Fair Value/ Market Value | |
|--|-----------------------------|----------------------------|
| | ----- | |
| DIVERSIFIED/CONGLOMERATE, MANUFACTURING - 9.33% | | ELECTRONICS - 1.09% |
| A H C Holdings Company, Inc. | \$ 1,567,332 | Barcodes Group, Inc. |
| Arrow Tru-Line Holdings, Inc. | 853,187 | Connecticut Electric, Inc. |
| C D N T, Inc. | 784,045 | Directed Electronics, Inc. |
| Headwaters, Inc. | 47,925 | |
| K P I Holdings, Inc. | 1,059,456 | |
| MEGTEC Holdings, Inc. | 1,129,821 | FINANCIAL SERVICES - 2.86% |
| Milwaukee Gear Company | 1,121,539 | American General Finance C |
| Nortek, Inc. | 110,627 | Citigroup, Inc. |
| O E C Holding Corporation | 506,546 | GATX Corporation |
| Postle Aluminum Company LLC | 1,968,356 | General Electric Capital C |
| Truck Bodies & Equipment International | 1,100,428 | Goldman Sachs Group, Inc. |
| Xaloy Superior Holdings, Inc. | 983,793 | Highgate Capital LLC |
| | ----- | International Lease Financ |
| | 11,233,055 | Morgan Stanley |
| | ----- | |
| DIVERSIFIED/CONGLOMERATE, SERVICE - 12.94% | | |
| A S C Group, Inc. | 1,380,701 | |

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| | | |
|-----------------------------------|------------|-----------------------------|
| A W X Holdings Corporation | 315,000 | HEALTHCARE, EDUCATION & CH |
| ACCO Brands Corporation | 50,288 | American Hospice Management |
| Advanced Technologies Holdings | 1,456,151 | F H S Holdings LLC |
| Affinia Group, Inc. | 25,750 | Qwest Diagnostic, Inc. |
| Apex Analytix Holding Corporation | 1,401,005 | Synteract Holdings Corpora |
| Associated Diversified Services | 694,419 | Touchstone Health Partners |
| C R H America, Inc. | 536,692 | Wheaton Holdings Corporati |
| Clough, Harbour and Associates | 1,441,508 | |
| Crane Rental Corporation | 1,212,223 | |
| Diversco, Inc./DHI Holdings, Inc. | 236,518 | |
| Dwyer Group, Inc. | 830,058 | HOME & OFFICE FURNISHINGS, |
| Equifax, Inc. | 532,611 | & DURABLE CONSUMER PRODUCT |
| Insurance Claims Management, Inc. | 181,594 | Connor Sport Court Interna |
| Iron Mountain, Inc. | 530,625 | H M Holding Company |
| Mail Communications Group, Inc. | 710,209 | Home Decor Holding Company |
| Nesco Holdings Corporation | 1,577,069 | Justrite Manufacturing Acq |
| Northwest Mailing Services, Inc. | 1,726,849 | K H O F Holdings, Inc. |
| Pearlman Enterprises, Inc. | -- | Monessen Holding Corporati |
| Tyco International Group | 751,004 | Stanton Carpet Holding Co. |
| | ----- | Transpac Holdings Company |
| | 15,590,274 | U M A Enterprises, Inc. |
| | ----- | U-Line Corporation |
| | | Wellborn Forest Holding Co |

CONSOLIDATED SCHEDULE OF INVESTMENTS (CONTINUED)
September 30, 2010
(Unaudited)

| INDUSTRY CLASSIFICATION: | Fair Value/ Market Value | |
|--|-----------------------------|----------------------------|
| | ----- | |
| LEISURE, AMUSEMENT, ENTERTAINMENT - 1.86% | | NATURAL RESOURCES - 2.29% |
| International Game Technology | \$ 594,210 | Appleton Papers, Inc. |
| Savage Sports Holding, Inc. | 1,381,713 | ArcelorMittal |
| Ticketmaster Entertainment, Inc. | 273,750 | Centveo Corporation |
| | ----- | Cytec Industries, Inc. |
| | 2,249,673 | Intrepid Potash, Inc. |
| | ----- | Lyondell Chemical Co. |
| MACHINERY - 7.26% | | The Valspar Corporation |
| A S A P Industries LLC | 677,667 | Verso Paper Holdings LLC |
| Davis-Standard LLC | 1,418,726 | |
| E S P Holdco, Inc. | 1,284,220 | |
| M V I Holding, Inc. | 634,794 | |
| Manitowoc Company, Inc. | 99,750 | OIL & GAS - 2.60% |
| Navis Global | 572,660 | Coffeyville Resources LLC |
| NetShape Technologies, Inc. | 567,000 | International Offshore Ser |
| Pacific Consolidated Holdings LLC | 711,314 | MBWS Ultimate Holdco, Inc. |
| Power Services Holding Company | 1,254,854 | Pride International, Inc. |
| R E I Delaware Holding, Inc. | 1,363,095 | Total E & S, Inc. |
| Safety Speed Cut Manufacturing Company, Inc. | 164,253 | |
| | ----- | |
| | 8,748,333 | PHARMACEUTICALS - 1.23% |
| | ----- | CorePharma LLC |
| MEDICAL DEVICES/BIOTECH - 3.88% | | |

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| | | |
|---|-----------|------------------------------|
| Coeur, Inc. | 707,298 | |
| E X C Acquisition Corporation | 40,585 | PUBLISHING/PRINTING - 0.24% |
| ETEX Corporation | -- | Gannett Company, Inc. |
| MedSystems Holdings LLC | 702,780 | Sheridan Acquisition Corpora |
| MicroGroup, Inc. | 1,208,526 | |
| OakRiver Technology, Inc. | 608,874 | |
| Precision Wire Holding Company | 1,405,947 | |
| TherOX, Inc. | -- | RETAIL STORES - 0.72% |
| | ----- | J. C. Penney Company, Inc. |
| | 4,674,010 | Olympic Sales, Inc. |
| | ----- | Rental Service Corporation |
| MINING, STEEL, IRON & NON-PRECIOUS METALS - 2.28% | | Rue21, Inc. |
| Allegheny Technology, Inc. | 604,286 | |
| T H I Acquisition, Inc. | 1,080,000 | TECHNOLOGY - 2.62% |
| Teck Resources, Ltd. | 37,779 | Compucom Systems, Inc. |
| Tube City IMS Corporation | 1,020,000 | Magnachip Semiconductor |
| | ----- | Sencore Holding Company |
| | 2,742,065 | Smart Source Holdings LLC |
| | ----- | ViaSystems, Inc. |

34

MassMutual Participation Investors

CONSOLIDATED SCHEDULE OF INVESTMENTS (CONTINUED)
September 30, 2010
(Unaudited)

| INDUSTRY CLASSIFICATION: | Fair Value/ Market Value |
|--------------------------------------|-----------------------------|
| | ----- |
| TELECOMMUNICATIONS - 3.29% | |
| All Current Holding Company | \$ 703,205 |
| Centurytel, Inc. | 518,649 |
| Intelsat Bermuda Ltd. | 733,125 |
| ITC^DeltaCom, Inc. | 130,531 |
| Spirit Capital Corporation | 442,200 |
| Sundance Investco LLC | -- |
| Telecorps Holdings, Inc. | 1,429,425 |
| | ----- |
| | 3,957,135 |
| | ----- |
| TRANSPORTATION - 0.0% | |
| NABCO, Inc. | -- |
| | ----- |
| UTILITIES - .03% | |
| Markwest Energy Operating Co. | 35,394 |
| | ----- |
| WASTE MANAGEMENT / POLLUTION - 1.50% | |
| Allied Waste NA | 535,625 |
| Terra Renewal LLC | 1,273,352 |
| Torrent Group Holdings, Inc. | -- |
| | 1,808,977 |
| | ----- |

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TOTAL INVESTMENTS - 104.37%

\$ 125,717,780
=====

See Notes to Consolidated Financial Statements

INCOME TAX INFORMATION

The aggregate cost of investments is substantially the same for financial reporting and Federal income tax purposes as of September 30, 2010. The net unrealized depreciation of investments for financial reporting and Federal tax purposes as of September 30, 2010 is \$11,848,145 and consists of \$12,106,802 appreciation and \$23,954,947 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 September 30, 2010:

| ASSETS | TOTAL | LEVEL 1 | LEVEL 2 | LEVEL 3 |
|-----------------------|---------------|---------|--------------|---------------|
| ----- | | | | |
| Restricted Securities | | | | |
| Corporate Bonds | \$ 90,563,786 | \$ -- | \$ 3,495,552 | \$ 87,068,234 |
| Common Stock - U.S. | 8,377,394 | -- | 3,905 | 8,373,489 |
| Preferred Stock | 3,546,788 | -- | -- | 3,546,788 |
| Partnerships and LLCs | 4,193,707 | -- | -- | 4,193,707 |
| Public Securities | | | | |

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| | | | | |
|-----------------------|---------------|------------|---------------|---------------|
| Corporate Bonds | 18,488,128 | -- | 18,488,128 | -- |
| Common Stock - U.S. | 547,977 | 547,977 | -- | -- |
| Preferred Stock | -- | -- | -- | -- |
| Short-term Securities | -- | -- | -- | -- |
| ----- | | | | |
| Total | \$125,717,780 | \$ 547,977 | \$ 21,987,585 | \$103,182,218 |

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 | | | | |
| Corporate Bonds | \$81,465,949 | \$ 3,337,086 | \$ 2,265,199 | \$ -- |
| Common Stock - U.S. | 7,767,378 | 1,138,392 | (532,281) | |
| Preferred Stock | 3,468,130 | 1,319,134 | (1,240,476) | |
| Partnerships and LLCs | 3,536,247 | 1,472,509 | (815,049) | |
| ----- | | | | |
| | \$96,237,704 | \$ 7,267,121 | \$ (322,607) | \$ -- |
| ----- | | | | |

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.

(Registrant) MassMutual Participation Investors

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

Michael L. Klofas, President

Date November 29, 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 November 29, 2010

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

James M. Roy, Vice President and
Chief Financial Officer

Date November 29, 2010

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