Enhancements in Morningstar Direct℠
Global Content, Data & Coverage

Apr 10 Update	► Morningstar Direct Home page applications ("apps")

► Morningstar Direct Home page applications ("apps")

  ► Market Commentary: Add monthly Fund Flows Commentary, Box Score type, Morningstar MSCI Hedge Fund Indexes reports and Talking Points which are monthly commentary written by Morningstar Fund Research

  ► U.S. Stock Sector Outlook: Detailed summaries of the themes Morningstar's U.S. stock analysts are watching, as well as which stocks are currently most attractive in each sector

  ► Morningstar U.S. Market Updates: Access content from Morningstar.com Midday and Post Market Updates

► New 'Hurdle Rate' data point for stocks

► New fund attributes including Commodity Tracking, Tax Managed, Contrarian, GNMA Security (US) and Flexible Asset Allocation

► 'Daily Price' and 'Daily Return Index' data points for IGSA universe

► 'Fund size' now a searchable data point under 'All managed investments'

► New data points 'Net Assets - Share Class (Daily)' and 'Fund Size (Surveyed-Daily)' under 'Historical Cash Flow Data'

► 'In-House FOF' flag indicates if funds managed by a fund company that invests in in-house funds

Mar 10 Release | Ver 3.8

► Separate accounts universe

  ► Submit request to add new product to database or update data for available product in database by clicking on "Request Update" button in the separate accounts universe grid view

  ► Generate collective PDF report of separate account manager narratives for selected strategy

  ► Manager narratives available as components for reports in Presentation Studio

  ► Morningstar Institutional Category gross return ranks

  ► Right click on separate account and select Document Library to access ADV Parts I and II

  ► Enhance output format when exporting manager narratives to Microsoft® Excel®

  ► Wrap/TAMP Availability data point in Operations view of U.S. separate accounts universe

  ► Enable all manager available phone and web address data points

  ► Search by new Separate Account Morningstar Institutional Categories – Core Plus Bond, Enhanced Cash Management, Infrastructure and Tactical Asset Allocation Balance

  ► New sub-universe for Australia Managed Accounts

► New Global Funds Manager universe located in People database under Global Databases to research by manager information

  ► Career start date

  ► Current company, company history

  ► Education including School, Year, Degree and Major

  ► Country, City, Province, Postal code, Phone, Fax, Email, Homepage and Address

  ► Ownership level

  ► Separate account asset managers and committee members

- Right-click on manager name to view history of all funds managed New measures to custom calculation library
  - Efficiency Ratio (geometric)
  - M-Squared
  - Gain Deviation
  - Loss Deviation
  - Upside Standard Deviation
  - Downside Standard Deviation
- Measures revised in custom calculation library
  - Downside Deviation
  - Upside Deviation
  - Gain Standard Deviation
  - Loss Standard Deviation
- Morningstar Direct Home
  - Launch Filings (formerly Document Library) under Home on the left navigation panel to access global filings for funds and stocks and ADV Part II
  - Enable Filings from Morningstar Document Library^{SM} specific to local markets
- Launch Help/Definitions under Home on the left navigation panel to access help information for data points, methodology, training information, and FAQs
- Morningstar Institutional Categories
  - New Commodities categories including Agriculture, Energy, Industrial Metals and Precious Metals
  - New Separate Account categories – Core Plus Bond, Enhanced Cash Management, Infrastructure and Tactical Asset Allocation Balance
  - Institutional Category gross return ranks
  - Select Morningstar Institutional Categories as a peer group
- ETF data points
  - Institutional ETF data points including Tracking Error, Daily Alpha before Expenses, Market Impact and Concentration Risk
  - ETF tags including Single Country, Dividend Yielding, Real Estate Tracking, Currency and Commodity
  - Historical NAV
- Additional data points
  - Annual report Expense Waiver, Prospectus Expense Waiver, Type and Expiration Date
  - Total Market short and net values
  - Mutual fund suspension tag
  - Hedge Fund historical price
  - Primary common share for stocks and primary share class for funds
- # of Funds in Category displayed in Returns grid view for use with Category rank
- New Japanese and Chinese data points including Local Japanese Firm name, as well as DC, LOF and Financial Plan Fund Flag
- Enhancement to New Zealand universe to include a mixed view which shows PIE fund Pre-Tax returns alongside non-PIE funds Post-Tax returns
- New Zealand Surveyed Asset Allocation and PIE Conversion Date
- Norwegian and Finnish Pension universe
- Singapore Restricted Fund database
- Australian Managed Accounts sub-universe in Separate Accounts universe
- New Taiwanese SITCA Categories
- German 'Large Investor' funds data point
- Numerous Chile data points including AAFM and SVS Local Categories

Mar 10 Release (cont'd)	▶ New 'Suspension Flag' which denotes funds whom are currently suspended from trading
	▶ Israel data points including ISA Code & Category, as well as Maximum Exposure
	▶ Australian local data points including Minimum Platform Initial and Fund Fee
	▶ Ability to search for Oldest Shareclass across all Investments
	▶ South African ASISA Local Category averages

Dec 09 Update	▶ Private Equity Firms and Firm Executive universes
	▶ Trailing Estimated Net Cash Flows
	▶ Morningstar credit ratings
	▶ Average Economic Moat
	▶ Calendar year dividends
	▶ Market index series name
	▶ Exchange country
	▶ Sedol identifier
	▶ UCITS hedge fund attributes
	▶ UK Life and Pension Fund Size
	▶ Asset change date
	▶ Morningstar Institutional Categories applied for U.S. separate accounts (available Dec 31)

Sep 09 Release	Ver 3.7	▶ Morningstar Direct Home page applications ("apps")
	▶ Market Commentary: Access most recent Morningstar and Ibbotson market commentary
	▶ Mutual Fund Commentary: Morningstar U.S. analysts' most recent insight on the investment industry
	▶ Fund Analyst Picks: Morningstar analysts' current mutual fund picks for each U.S. category
	▶ Third Party Commentary: Most recent broad market and economic commentary from non-Morningstar sources
	▶ Click on Customize This Page (formerly Edit) to add/remove apps
	▶ More data definitions in Document Library
	▶ Search for manager history information across all investment universes
	▶ Separate account manager provided narrative
	▶ Historical assets data for separate accounts by firm type and for hedge funds at firm level
	▶ Minimum initial investment for separate account investments
	▶ Preferred Stocks and preferred-specific data points
	▶ Tag for ADR stocks
	▶ Leveraged ETF and Inverse/Short data points in ETF universe
	▶ Fixed-Inc Sector Exposure and Fixed-Inc Country Exposure for open-end fund universe
	▶ MPT Risk Free Rate added to Risk views
	▶ Inception date of underlying insurance funds
	▶ Display Company Standard Name
	▶ Average Drawdown, Covariance, Covariance (non-excess return), and Sterling Ratio as new Custom Calculations
	▶ View Absolute Rank in category
	▶ Tag Shariah Compliant funds
	▶ FIP category data point
	▶ Display Minimum initial investment in currency or unit
	▶ Australian income and growth returns, distribution reinvest price, historical surveyed asset allocation, and fee data
	▶ Multiple language versions of European and Asian Qualitative Reports
	▶ Japanese ITA Code

Jun 09 Update	► Morningstar Institutional Categories for U.S. open-end, closed-end, ETF, and money market universes
	► Daily portfolios for global exchange-traded funds
	► Six new commodity based and four new U.S. sector based Morningstar categories
	► New Morningstar Sector Structure maps each equity into one of 213 industries (previously 129 industries), and the industries are subsequently mapped into 91 industry groups based on common operational characteristics
	► New U.S. Insurance Group Separate Account ("IGSA") used to fund retirement accounts
	► New investment universes:
	► Denmark and New Zealand stocks
	► Chile and Slovenia open-end funds
	► German ETFs
	► Qualitative Reports available in multiple languages and Qualitative Ratings in grid view and in Fund Analysis
	► Fund level tags for China QDII and Malaysia EPF
	► Divided New Zealand categories into PIE (Portfolio Investment Entity) and non-PIE
Mar 09 Release | Ver 3.6.1	► Morningstar Direct Home page ("apps")
	► Market Cap Breakpoints: Track month-end market cap breakpoints for multiple regions
	► Upcoming Training: See scheduled training webcasts
	► Recent Additions, Recent Closes, and Recent Mergers/Liquidations: View changes to the Morningstar databases
	► Recent Update/Enhancements: Get updates on product development ands fixes
	► Market: Monitor market indexes in Canada, Australia, Asia, and Europe and auto refresh the intra-day market graph
	► Unit Investment Trust universe
	► Over 400 new stock data points including current and historical operational ratios and profitability ratios
	► Currency conversion for stock data points found on the income statement, balance sheet, and statement of cashflow
	► Target asset allocation fund glide path data
	► Data point identifying mutual fund administrators and multiple advisors of a fund
	► Search for the primary share class of investments in GIFS categories and display average performance
	► S&P Specialist Sector at the fund level
	► View more holding types in the detailed holding analysis including Bond–Option (Call)
	► Australian funds surveyed asset allocation
	► New categories for India, Thailand, and South Africa (ASISA)
	► UK IMA "Property" sector
	► Italian pension fund wrapper level data points
	► MPF Sector data point for Hong Kong
	► MPF sub-universe under Insurance/Life Products
	► OMX Index sub-universe under Market Indexes
	► Historical monthly yield for Market Indexes and seven-day yields for Money Market Funds
Dec 08 Release | Ver 3.6	► Global Document Library
	► View company public documents, including financials, announcements, ownership, proxies, registrations, and insider activities
	► Search investment terms and data points for definitions, methodology papers, examples of use, and related data
	► Historical fund size (surveyed and estimates) for global investment universes
	► Fair value analysis data points for ETFs
	► Quarter-end stock returns
	► U.S. Fixed-Inc Muni Sector Exposure breakdowns (Super sector, Primary sector, Secondary sector, and Muni sector)

Dec 08 Release (cont'd)	▶ Equity country exposure to Estonia, Latvia, Lithuania, and Vietnam
	▶ Historical daily price for close-end funds
	▶ Historical NAV for life insurance products
	▶ Standardized return periods for U.S. variable annuity sub-accounts (Trailing, Quarter-end, 1, 3, 5, 10 year, and Since Inception)
Oct 08 Release | Ver 3.5	▶ Launched Global Document Library to search and view company and investment public documents
	▶ Fee Schedule and Breakdown for U.S. open-end funds (front and deferred loads, redemption, management, and administrative fee)
	▶ Operational data points for Separate Account/Collective Investment Trust (CIT) management fee breakpoints
	▶ Returns (Daily) and CUSIP data points for CITs
	▶ Returns (Daily) data point for variable annuity/life underlying funds
	▶ Over 400 new stock data points, including historical, operation ratios, growth rates, fundamental data
	▶ Additional 600 data definitions
	▶ View portfolio short positions in holdings details
	▶ More international stock coverage (UK, Italy, Ireland)
May 08 Release | Ver 3.4	▶ Availability of Obsolete Securities
	▶ Search or Find obsolete securities that have merged or liquidated, including open-end funds, hedge funds and stocks
	▶ Research historical returns, share class/fund sizes, cash flows and holdings-based style trails
	▶ Include performance in time series charts and custom calculations
	▶ View three new data points: Obsolete Type, Obsolete Date, and Merged into Security
	▶ Organized U.S. Policy and Subaccount universes into Group/Non-Group sub-universes
	▶ Dividend payment schedule (monthly, quarterly, annually) added
	▶ Analyst Assigned benchmark a viewable data point
	▶ Added Historical Morningstar Category back to 2003
	▶ Historical annual income return and growth return
	▶ Fund Size as of date
	▶ Daily return index for GIFS averages, enabling point-to-point performance calculation on GIFS level
	▶ Analyst reports available for UK and Australian sub-universes
	▶ Historical Rating and Rank data available for UK Life and Pension universe
	▶ Category percentile ranks available for UK Life and Pension universe