

CORNERSTONE RESEARCH

Economic and Financial Consulting and Expert Testimony

# Securities Class Action Filings

2020 Midyear Assessment

# Table of Contents

Executive Summary	1
Key Trends in Federal Filings	2
Featured: State Court 1933 Act Filings	3
Number of Federal and State Filings	4
New: S&P 500 Sector Performance	5
New: Filing Counts by Month	6
New: Summary of Trend Cases	7
Market Capitalization Losses for Federal and State Filings	8
U.S. Exchange-Listed Companies	10
Heat Maps: S&P 500 Securities Litigation™ for Federal Filings	11
Status of Federal Securities Class Action Filings	13
1933 Act Cases Filed in State Courts	14
Dollar Loss on Offered Shares Index™ (DLOS Index™)	15
Federal Section 11 Filings and State 1933 Act Filings—Pre- and Post- <i>Cyan</i>	16
Type of Security Issuance Underlying Federal Section 11 and State 1933 Act Filings	17
Combined Federal and State Filing Activity—Highlighting Federal Section 11 and State 1933 Act Filings	18
New: Performance of Recent IPOs	19
Federal Filings against Non-U.S. Issuers	20
Industry Comparison of Federal Filings	22
Federal Filings by Circuit	23
New: Most Frequent Plaintiff Counsel on Core Federal Filings	24
M&A Filings by Federal Circuit	25
New: Most Frequent Plaintiff Counsel on M&A Filings	26
New Developments	27
Glossary	28
Appendices	30
Research Sample	34

# Table of Figures

Figure 1: Semiannual Class Action Filings Summary	1
Figure 2: State Court 1933 Act Filings Summary	3
Figure 3: Class Action Filings Index® (CAF Index®) Semiannual Number of Class Action Filings	4
Figure 4: S&P 500 Sector Performance—Returns and Maximum Declines	5
Figure 5: Number of Core Filings by Month	6
Figure 6: Summary of Trend Cases—Core Filings	7
Figure 7: Disclosure Dollar Loss Index® (DDL Index®)	8
Figure 8: Maximum Dollar Loss Index® (MDL Index®)	9
Figure 9: Percentage of U.S. Exchange-Listed Companies Subject to Federal or State Filings	10
Figure 10: Heat Maps of S&P 500 Securities Litigation™ Percentage of Companies Subject to Core Federal Filings	11
Figure 11: Heat Maps of S&P 500 Securities Litigation™ Percentage of Market Capitalization Subject to Core Federal Filings	12
Figure 12: Status of Filings by Year—Core Federal Filings	13
Figure 13: State 1933 Act Filings by State	14
Figure 14: Dollar Loss on Offered Shares Index™ (DLOS Index™) for Federal Section 11–Only and State 1933 Act Filings	15
Figure 15: Pre- and Post-Cyan Semiannual Federal Section 11 and State 1933 Act Filings	16
Figure 16: Federal Section 11 and State 1933 Act Class Action Filings by Type of Security Issuance	17
Figure 17: Federal Section 11 and State 1933 Act Class Action Filings by Venue	18
Figure 18: Performance of Recent IPOs	19
Figure 19: Annual Number of Class Action Filings by Location of Headquarters—Core Federal Filings	20
Figure 20: Non-U.S. Filings by Location of Headquarters—Core Federal Filings	21
Figure 21: Filings by Industry—Core Federal Filings	22
Figure 22: Filings by Circuit—Core Federal Filings	23
Figure 23: Most Frequent Plaintiff Counsel on Core Federal Filings	24
Figure 24: Semiannual M&A Filings by Federal Circuit	25
Figure 25: Most Frequent Plaintiff Counsel or Co-counsel on M&A Filings	26
Appendix 1: Filings Basic Metrics	30
Appendix 2A: S&P 500 Securities Litigation—Percentage of S&P 500 Companies Subject to Core Federal Filings	31
Appendix 2B: S&P 500 Securities Litigation—Percentage of Market Capitalization of S&P 500 Companies Subject to Core Federal Filings	31
Appendix 3: 1933 Act Filings in State Courts	32
Appendix 4: Filings by Industry—Core Federal Filings	32
Appendix 5: Filings by Circuit—Core Federal Filings	33

# Executive Summary

In the first half of 2020, U.S. financial markets experienced extreme uncertainty and volatility as the economic consequences of the COVID-19 pandemic became apparent. Government stimulus efforts to assist companies negatively affected by shelter-in-place requirements and individuals furloughed from their jobs calmed financial markets to a degree.

Stock valuations rebounded from lows in late March and early April, but many industries still experienced meaningful declines in market capitalization from the beginning of the year through the end of June. Against this backdrop, filing activity increased in March and April, declined in May, but then rebounded in June.

## Number and Size of Filings

- Plaintiffs filed 182 **new class action securities cases** (filings) across federal and state courts in the first half of 2020, 117 of which were core filings. While the total number of filings is high compared with historical averages, it is 18 percent lower than in the second half of 2019. (page 4)
- Federal and state court class actions alleging **claims under the Securities Act of 1933** (1933 Act) declined significantly in the first half 2020, despite recent initial public offerings (IPOs) trading below offering prices. (pages 3, 19)
- **Disclosure Dollar Loss (DDL)** decreased by 25 percent from \$108 billion in the second half of 2019 to \$81 billion in the first half 2020. (page 8)
- **Maximum Dollar Loss (MDL)** increased by 48 percent from \$394 billion in the second half of 2019 to \$584 billion, due in part to market capitalization losses in a broad swath of industry sectors during the first half of the year. (page 9)

## Other Measures of Filing Intensity

- In the first half of 2020, the likelihood of core filing litigation against **U.S. exchange-listed companies** decreased to an annualized rate of 4.2 percent. This is comparable to rates observed in 2016 and 2017, but lower than 2018 and 2019 when the likelihood was 4.8 percent and 5.5 percent, respectively. (page 10)
- On an annualized basis, approximately one in 21 **S&P 500** companies (4.8 percent) was subject to litigation in federal courts in the first half of 2020. (pages 11–12)

*117 core filings occurred in the first half of the year, a 13 percent decrease from the semiannual filing activity in both halves of 2019.*

Figure 1: Semiannual Class Action Filings Summary

	Semiannual (1997 H1–2019 H2)			2019 H1	2019 H2	2020 H1
	Average	Maximum	Minimum			
Class Action Filings	112	222	55	207	221	182
Core Filings	95	134	55	134	134	117
Disclosure Dollar Loss (\$ billions)	\$68	\$175	\$11	\$175	\$108	\$81
Maximum Dollar Loss (\$ billions)	\$331	\$1,121	\$52	\$798	\$394	\$584

# Key Trends in Federal Filings

Not surprisingly, allegations related to issuers' responses to COVID-19 began appearing in filings in mid-March. Several trends observed in prior years against issuers of cryptocurrencies and cannabis companies continued in 2020.

## U.S. Companies

- Core federal filings against S&P 500 firms in 2020 occurred at an annualized rate of 4.8 percent, the lowest since 2015. [\(page 10\)](#)

## Non-U.S. Companies

- Over 30 percent of core federal filings were against non-U.S. issuers, the highest rate observed since the wave of filings related to reverse mergers in 2011.
- Although annualized total core federal filings were down 9 percent, annualized core federal filings against non-U.S. issuers are on pace to be the highest on record.
- Approximately 20 percent of core federal filings against non-U.S. issuers had allegations related to cryptocurrencies. [\(page 20–21\)](#)

## By Industry

- The number of **Technology** and **Communications** filings declined after rising in recent semiannual periods. Together they fell 37 percent compared with the second half of 2019.
- The first half of 2020 saw an increase in filing activity in the **Financial** sector compared to the year prior, with the number of filings increasing by 50 percent from 2019 H1, and MDL increasing tenfold. [\(page 22, 32\)](#)

## By Circuit

- There were 40 core federal filings in the **Second Circuit**, dropping from 51 and 52 in 2019 H1 and 2019 H2, respectively.
- **Ninth Circuit** filings increased from 24 in the second half of 2019 to 35 in the first half of 2020.
- **Third Circuit** core filings declined to 11 in the first half of 2020 from 13 in the second half of 2019, but remained above the 1997–2019 average of nine. [\(page 23\)](#)

## Trend Cases

- In March, securities class action complaints first began to reference issues related to COVID-19. In total, there were 11 complaints filed involving disclosures regarding companies' responses to the pandemic in 2020 H1.
- Many other event-driven filings (e.g., involving allegations of cybersecurity problems, stemming from the opioid epidemic, or containing allegations of sexual harassment) were infrequent or nonexistent in the first half of the year.
- Issuers representing more novel business propositions (e.g., companies issuing cryptocurrencies or facilitating the sale of these instruments, or companies involved in cannabis-related products or services) continued to be sued, although more sporadically. [\(page 7\)](#)

## M&A Filings

- There were 65 federal M&A filings in the first half of 2020, the fewest in federal courts since the second half of 2016.
- Filings in the Third Circuit accounted for 91 percent of all M&A filings in the first half of 2020; all of these filings were brought in Delaware federal courts. The number of filings in all circuits decreased or remained unchanged relative to the second half of 2019. [\(page 25\)](#)

## New Developments

- On March 18, 2020, the Delaware Supreme Court issued a decision in *Sciabacucchi v. Salzberg*. At issue was whether forum-selection provisions in corporate charters could require that some class action securities claims under the 1933 Act be adjudicated in federal courts. This decision reversed a December 2018 opinion of the Delaware Chancery Court that such charter provisions were invalid under Delaware law. [\(page 27\)](#)
- Legislation is pending that would delist the securities of companies in jurisdictions (such as China, France, and Belgium) that restrict Public Company Accounting Oversight Board (PCAOB) inspection. [\(page 27\)](#)

# Featured: State Court 1933 Act Filings

Securities class action filings with 1933 Act claims decreased substantially in state courts in the first half of 2020, reversing an upward trend of state filings following the 2018 U.S. Supreme Court decision in *Cyan Inc. v. Beaver County Employees Retirement Fund*.

- The number of 1933 Act cases filed in state courts (state 1933 Act filings) decreased in California, New York, and other states. In California there appear to have been no state-only 1933 Act filings for the first time since 2017 H1. (page 14)
- The MDL of state 1933 Act filings in the first half of 2020 decreased by 52 percent from \$31.5 billion to \$14.9 billion. For state-only 1933 Act filings this decrease was more pronounced, declining 71 percent from \$17.4 billion to \$5.0 billion.
- Of all state 1933 Act filings in the first half of 2020, 45 percent had a parallel action in federal court. (page 16)
- Although parallel filings made up 45 percent of 1933 Act filings, they comprised 67 percent of the MDL for 1933 Act filings due to a single large company.

*The number of state 1933 Act filings was the lowest it has been since 2017, before the Cyan decision.*

Figure 2: State Court 1933 Act Filings Summary

	Semiannual Average (2011 H1–2019 H2)	2019 H1	2019 H2	2020 H1
<b>1933 Act Class Action Filings</b>				
Filings in State Courts Only	4	13	15	6
California	2	2	3	0
New York	1	5	8	4
All Other States	1	6	4	2
Parallel Filings in State and Federal Courts	4	11	14	5
Total	8	24	29	11
<b>Maximum Dollar Loss (\$ billions)</b>				
MDL of Filings in State Courts Only	\$5.6	\$5.9	\$17.4	\$5.0
California	\$4.3	\$0.6	\$0.2	\$0.0
New York	\$0.7	\$1.1	\$11.9	\$3.2
All Other States	\$0.6	\$4.2	\$5.4	\$1.8
MDL of Parallel Filings in State and Federal Courts	\$4.8	\$12.5	\$14.1	\$10.0
Total MDL	\$10.4	\$18.4	\$31.5	\$14.9

Note:

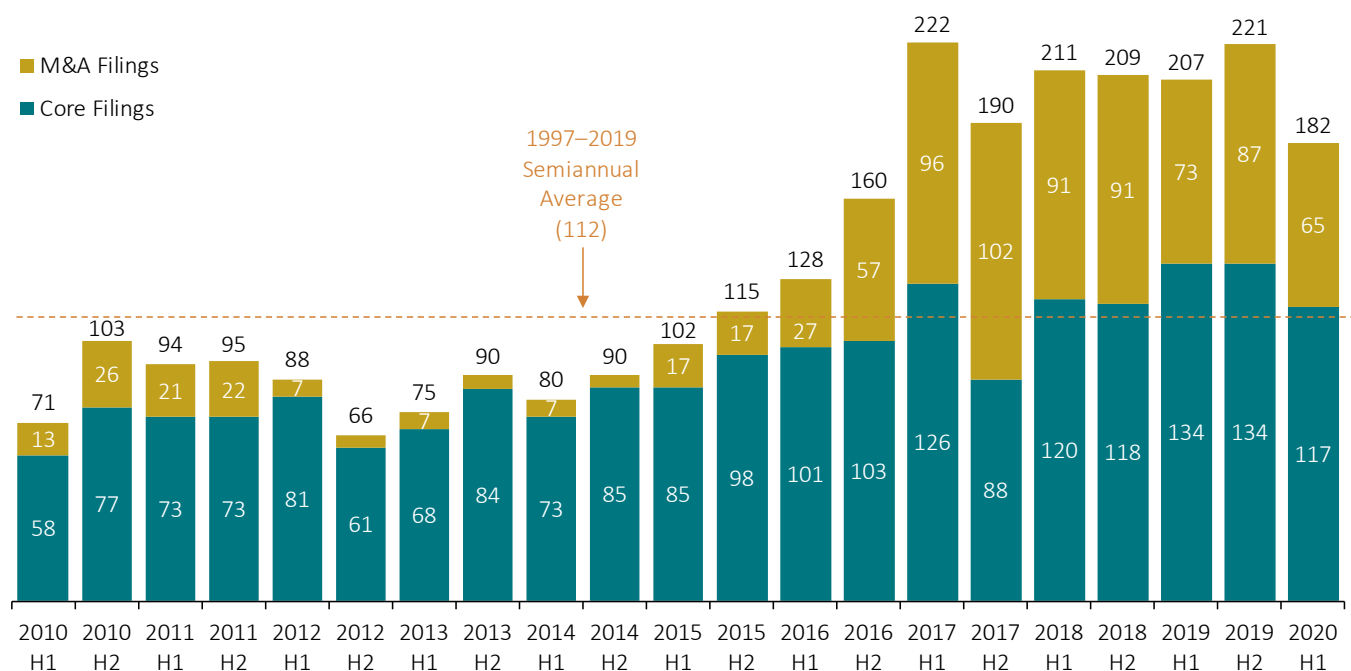
1. Filings in state courts may have parallel cases filed in federal courts. When parallel cases are filed in different years, the earlier filing is reflected in the figure above. Accordingly, counts that include parallel filings may differ from counts of state filings because a parallel filing may be counted in a prior year. Filings against the same company brought in different states without a filing brought in federal court are counted as unique state filings.
2. Beginning in 2018, the Securities Class Action Clearinghouse began tracking 1933 Act filings in California state courts containing Section 11 or Section 12 claims; there were six filings in California state courts with only Section 12 claims in 2018. Filings in other state courts are currently only those with Section 11 claims.
3. Figures may not sum due to rounding.
4. From 2011 through the first half of 2020, plaintiffs filed at least 172 state 1933 Act filings. At least 87 were filed in California and 41 in New York.

# Number of Federal and State Filings

- There were 182 filings in the first half of 2020, the lowest number since 2016 H2. The decline in Section 11 filings was the primary reason for the overall reduction in filing activity in the first half of the year.
- The filing slowdown affected both core and M&A filings, which had drops in activity of 13 and 25 percent, respectively.
- As merger deal activity slowed, so did merger filing activity. The number of non-withdrawn mergers over \$100 million with a public company target whose shares or American Depositary Receipts (ADRs) traded on a U.S. exchange fell from around 80 with announcement dates in 2019 H2 to approximately 30 with announcement dates in 2020 H1.

*Total filing activity dropped by 18 percent in the first half of 2020 compared with the second half of 2019.*

Figure 3: Class Action Filings Index® (CAF Index®) Semiannual Number of Class Action Filings 2010 H1–2020 H1



Note: This figure begins including state 1933 Act filings in the semiannual counts in 2010. Parallel class actions are only reflected as a single filing. When parallel cases are filed in different years, the earlier filing is reflected in the figure above. Accordingly, counts that include parallel filings may differ from counts of state filings because a parallel filing may be counted in a prior year.

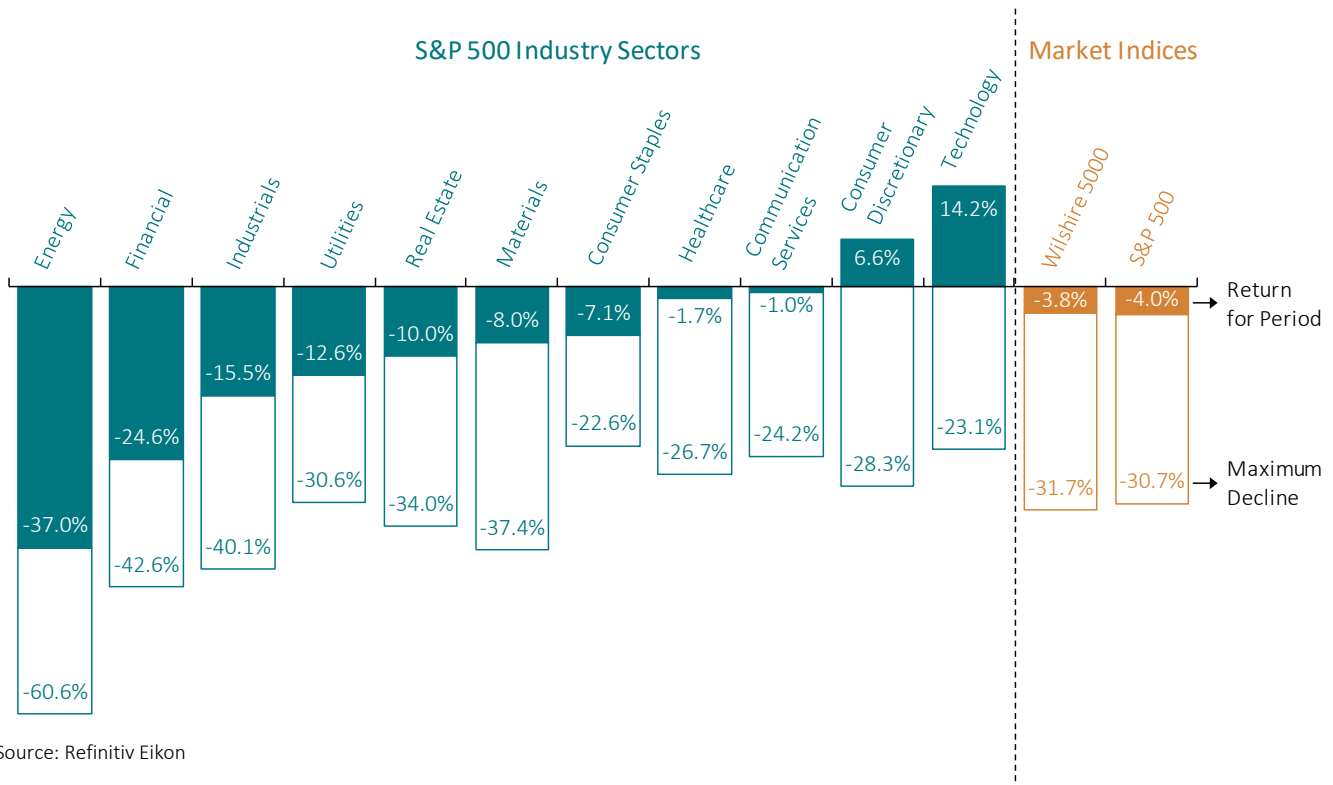
# New: S&P 500 Sector Performance

Financial markets were volatile during the first half of 2020, falling dramatically during late February through mid-March before reversing peak losses to varying degrees starting in late March. This analysis shows the returns and maximum declines of S&P 500 industry sectors in comparison with broader market indices since the start of 2020.

*The S&P 500 and the Wilshire 5000 experienced negative returns of 4.0 and 3.8 percent over the first half of the year, respectively, although both indices were substantially lower at interim points in the period.*

- Of the 11 industry sectors analyzed, nine experienced negative returns over the first half of 2020.
- Every industry sector declined substantially in March. Consumer Staples companies experienced the smallest decline of 22.6 percent, while companies in the Energy sector declined 60.6 percent.
- The largest losses for the first half of the year were in the Energy and Financial sectors, with negative returns of 37.0 percent and 24.6 percent, respectively.
- The Technology sector experienced the highest positive return of 14.2 percent, although it too had declined by 23.1 percent earlier in first half of the year.

Figure 4: S&P 500 Sector Performance—Returns and Maximum Declines 2020 H1



Source: Refinitiv Eikon

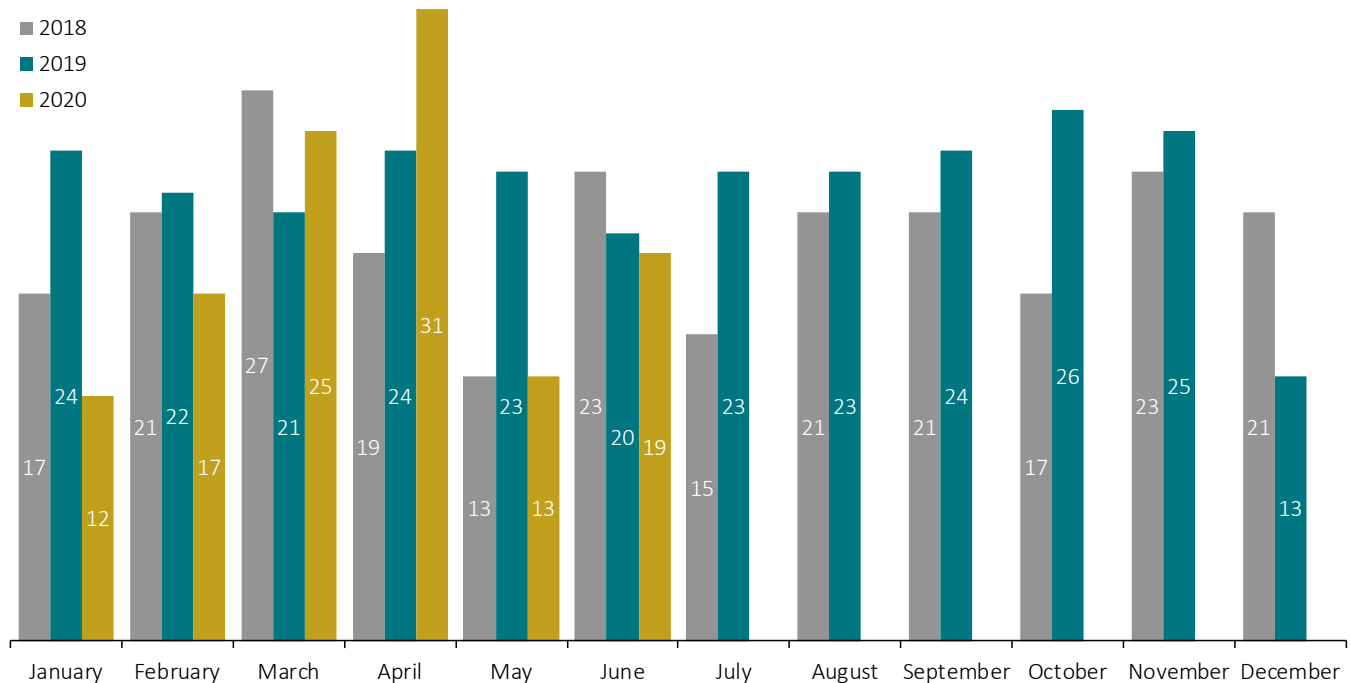


# New: Filing Counts by Month

- After lower filing activity in January, the number of filings each month steadily increased through April before declining again in May. Filings in June then rebounded to monthly totals higher than those in January and February, prior to the onset of the COVID-19 pandemic.
- The peak in April was influenced by the filings on April 3, 2020, of 11 similar securities class actions brought by two law firms against companies that had initial coin offerings or that provided exchanges for the trading of cryptocurrencies.
- Plaintiffs filed 117 new core securities class actions across federal and state courts in the first half of 2020, the lowest number of core filings over a half-year period in the last three years and 13 percent lower than in 2019 H2 (134).

*Filing activity fluctuated in the first half of the year, with both the lowest (January) and highest (April) monthly totals of core filings in the last three years.*

Figure 5: Number of Core Filings by Month 2018–2020 H1



Source: Refinitiv Eikon

Note: Counts include core filings in federal court and 1933 Act filings in state court. Core filings exclude M&A filings. Filings in state courts may have parallel cases filed in federal courts. When parallel cases are filed in different years, the earlier filing is reflected in the figure above. Accordingly, counts that include parallel filings may differ from counts of state filings because a parallel filing may be counted in a prior year. On April 3, 2020, 11 similar securities class actions brought by two law firms were filed against companies that had initial coin offerings or that provided exchanges for the trading of cryptocurrencies.

# New: Summary of Trend Cases

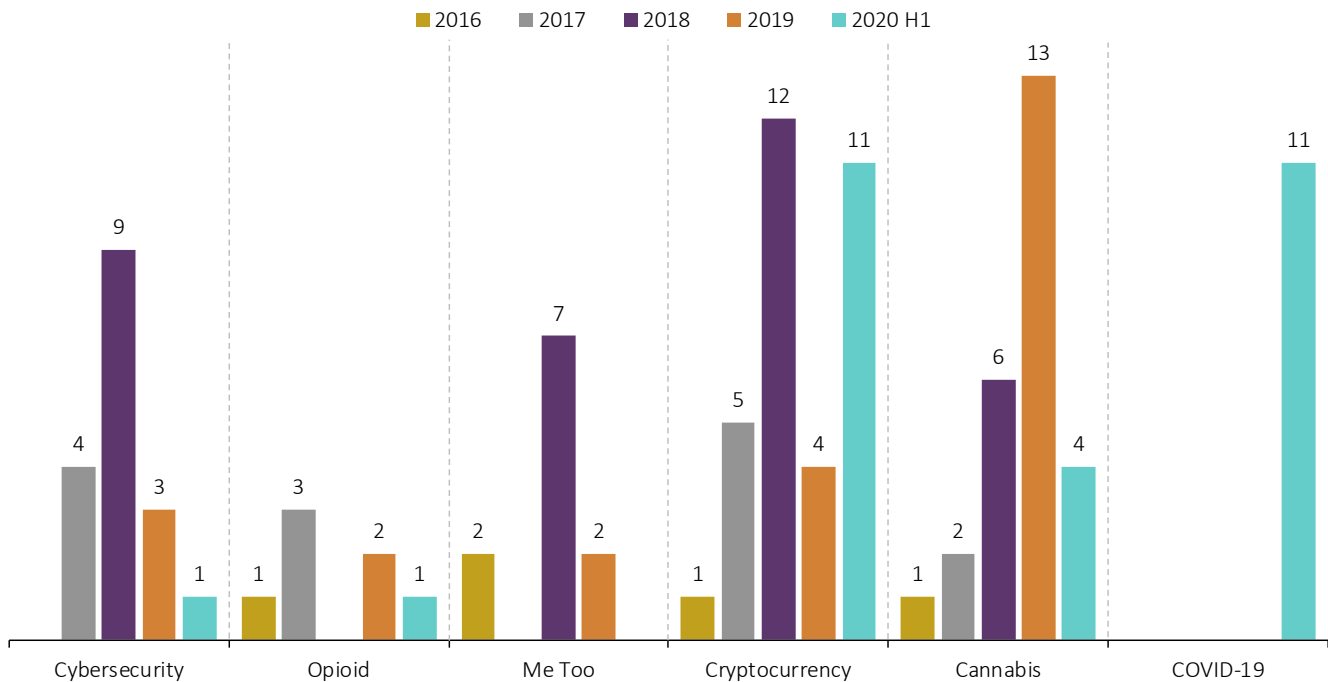
This exhibit highlights different trends that have appeared in core filing activity in recent years.

- Cybersecurity filings are those in which allegations relate to data breaches or security vulnerabilities.
- Opioid filings involve allegations related to opiate drugs that are addictive, were falsely marketed as non-addictive, or caused other opiate-related issues.
- Me Too filings involve allegations of sexual harassment that are central to the claims.
- Cryptocurrency filings include blockchain or cryptocurrency companies that engaged in the sale or exchange of tokens (commonly initial coin offerings), cryptocurrency mining, cryptocurrency derivatives, or that designed blockchain-focused software.
- Cannabis filings include companies financing, farming, distributing, or selling cannabis and cannabidiol products.
- COVID-19 filings include allegations related to companies negatively impacted by the virus or looking to address demand for products as a result of the virus.

*Aside from a flurry of cryptocurrency filings and multiple cannabis-related filings, previous trend cases subsided while COVID-19-related filings emerged.*

- In the first half of the year, there were 11 filings related to COVID-19.
- There were 11 cryptocurrency complaints filed on April 3, brought by two law firms against companies issuing ECR-20 digital tokens on the Ethereum blockchain or against companies that provided exchanges for those tokens. A majority of these issuers were headquartered outside the United States.
- Three of four cannabis-related filings in the first half of the year were against companies headquartered in Canada.

Figure 6: Summary of Trend Cases—Core Filings 2016–2020 H1



Note: There are six filings that appeared in multiple trend categories.

# Market Capitalization Losses for Federal and State Filings

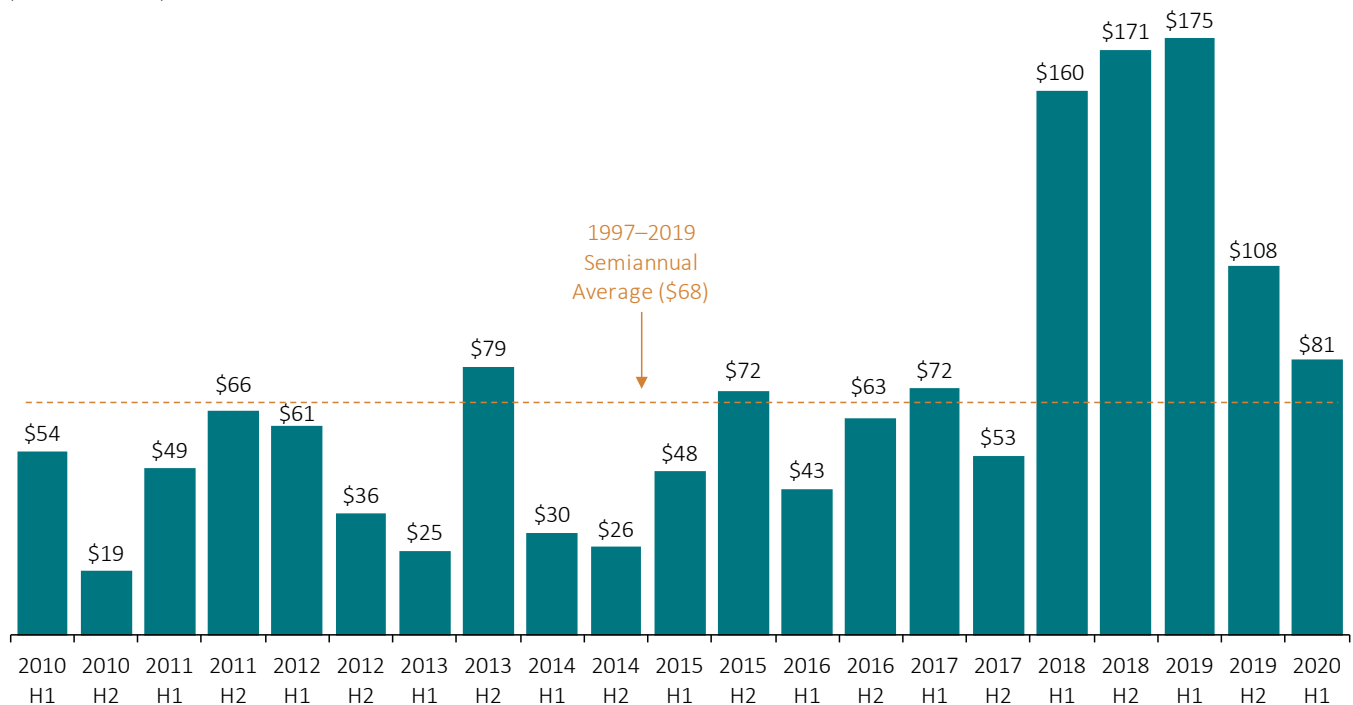
## Disclosure Dollar Loss Index® (DDL Index®)

This index measures the aggregate annual DDL for all federal and state filings. DDL is the dollar value change in the defendant firm’s market capitalization between the trading day immediately preceding the end of the class period and the trading day immediately following the end of the class period. See the Glossary for additional discussion on market capitalization losses and DDL.

*The DDL Index declined to its lowest semiannual level since 2017 H2, down 54 percent from its high in 2019 H1.*

- The DDL Index fell to \$81 billion in 2020 H1, down 25 percent from 2019 H2 and 54 percent below its all-time high in 2019 H1. This represents the lowest total for a half year since 2017 H2, but remains above the 1997–2019 semiannual average.
- A decrease in the number of core filings (down 13 percent from the second half of 2019) contributed to the decline in the DDL Index.
- The largest contributors to the DDL Index were the Consumer Non-Cyclical (41 percent) and Financial (25 percent) sectors (see Appendix 4).

Figure 7: Disclosure Dollar Loss Index® (DDL Index®)  
2010 H1–2020 H1  
(Dollars in billions)



Note: This figure begins including DDL associated with state 1933 Act filings in 2010. DDL associated with parallel class actions are only counted once.

**Maximum Dollar Loss Index® (MDL Index®)**

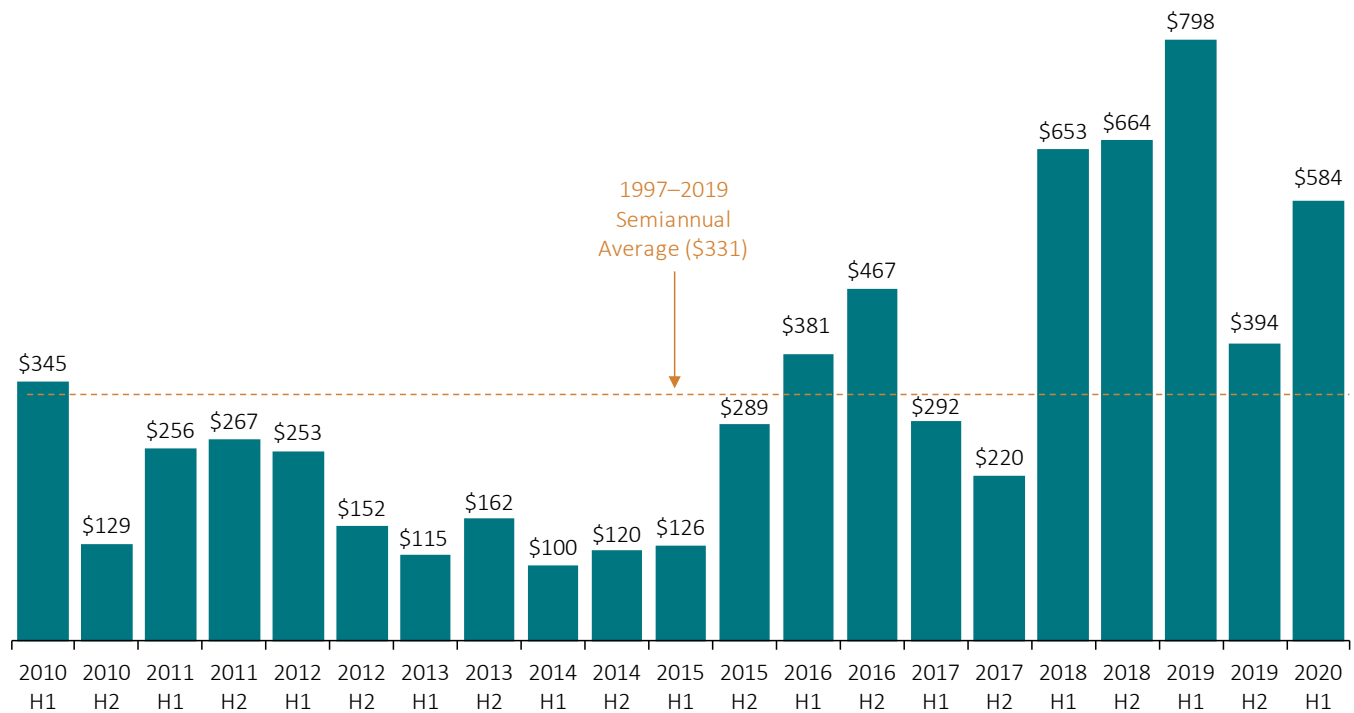
This index measures the aggregate annual MDL for all federal and state filings. MDL is the dollar value change in the defendant firm’s market capitalization from the trading day with the highest market capitalization during the class period to the trading day immediately following the end of the class period. See the Glossary for additional discussion on market capitalization losses and MDL.

- The MDL Index was \$584 billion in the first half of 2020. Relative to the second half of 2019, the MDL Index increased by 48 percent even though the number of total core filings fell by 13 percent. This difference is partially due to one filing that made up 31 percent of total MDL for the first half of 2020.
- See Appendix 1 for MDL totals, averages, and medians from 1997 H1 to 2020 H1.

- The largest contributor to the MDL Index was the Financial sector, which comprised 42 percent of the total MDL (see Appendix 4).

*The MDL Index rebounded sharply in the first half of the year, up 48 percent from the second half of 2019.*

**Figure 8: Maximum Dollar Loss Index® (MDL Index®)**  
2010 H1–2020 H1  
(Dollars in billions)



Note: This figure begins including MDL associated with state 1933 Act filings in 2010. MDL associated with parallel class actions are only counted once.

# U.S. Exchange-Listed Companies

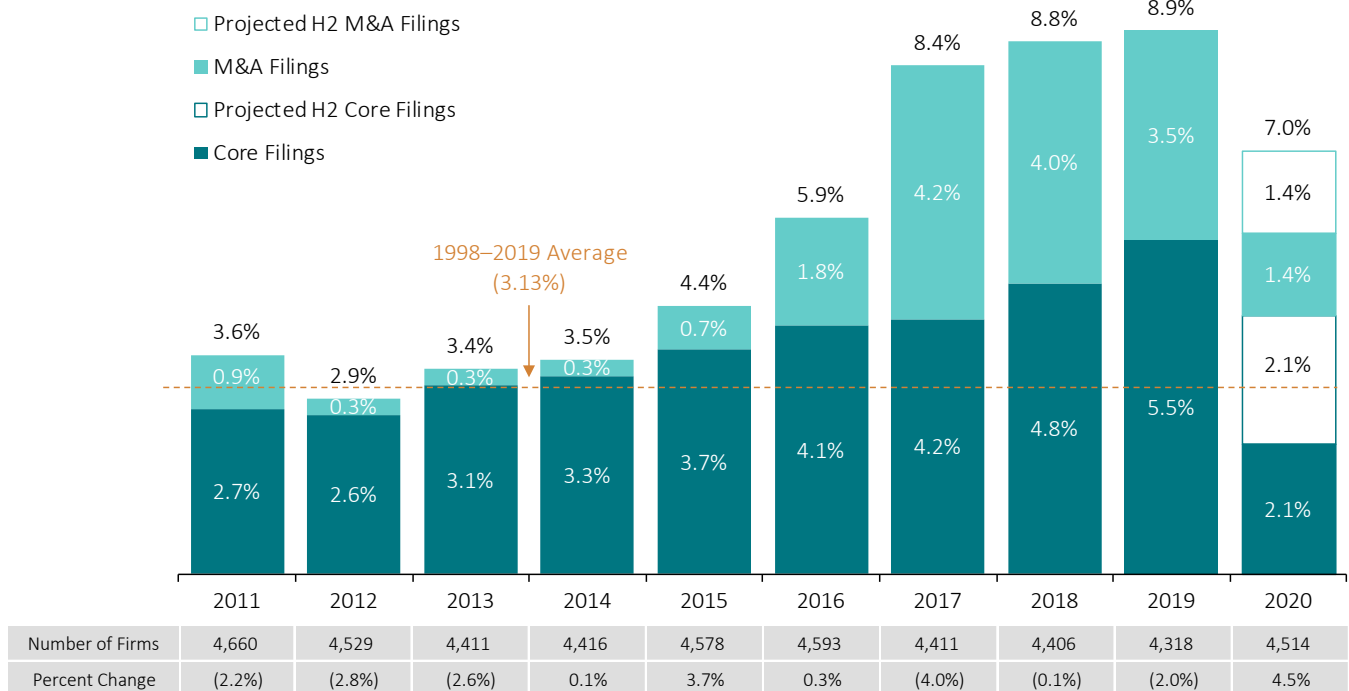
The percentages below are calculated as the unique number of companies listed on the NYSE or Nasdaq subject to federal or state securities fraud class actions in a given year divided by the unique number of companies listed on the NYSE or Nasdaq.

- Annualizing data from the first half of the year, 7.0 percent of companies listed on major U.S. exchanges may become subject to a filing in 2020. This is the first decrease since 2012, and represents a decline from 2018 and 2019 levels.
- Of U.S. exchange-listed companies, 2.1 percent, or 4.2 percent on an annualized basis, were the subject of a core filing in the first half of 2020. This would be the lowest exposure since 2017.

*If core filings continue at the current rate, the percentage of firms subject to a core filing will decrease for the first time in eight years.*

- The percentage of exchange-listed companies subject to M&A filings in 2020 is on pace to decline for the third straight year, after increasing between 2012 and 2017.

**Figure 9: Percentage of U.S. Exchange-Listed Companies Subject to Federal or State Filings 2011–2020 H1**



Source: Securities Class Action Clearinghouse; Center for Research in Security Prices (CRSP)

Note:

1. Percentages are calculated by dividing the count of issuers listed on the NYSE or Nasdaq subject to filings by the number of companies listed on the NYSE or Nasdaq as of the beginning of the year.
2. Listed companies were identified by taking the count of listed securities at the beginning of each year and accounting for cross-listed companies or companies with more than one security traded on a given exchange. Securities were counted if they were classified as common stock or ADRs and listed on the NYSE or Nasdaq.
3. Percentages may not sum due to rounding.
4. This figure begins including issuers facing suits in state 1933 Act filings in 2010.

# Heat Maps: S&P 500 Securities Litigation™ for Federal Filings

The Heat Maps illustrate federal court securities class action activity by industry sector for companies in the S&P 500 index. Starting with the composition of the S&P 500 at the beginning of each year, the Heat Maps examine each sector by:

- (1) The percentage of these companies subject to new securities class actions in federal court during each calendar year.
  - (2) The percentage of the total market capitalization of these companies subject to new securities class actions in federal court during each calendar year.
- Of the companies in the S&P 500 at the beginning of 2020, approximately one in 21 companies (4.8 percent) was a defendant in a core federal filing during the year, a 33.2 percent decrease from 2019. See Appendix 2A for percentage of companies by sector from 2001 to 2019.

*The likelihood of an S&P 500 company being sued declined to pre-2016 levels after reaching 10-year highs in 2018 and 2019.*

- The rate of core federal filings against Energy/Materials and Utilities firms fell to zero from 3.7 percent and 6.9 percent of companies, respectively, in 2019.
- All sectors except for Consumer Discretionary and Financials/Real Estate saw a decrease in core federal filings from 2019 to 2020 (annualized).
- The rate of core federal filings against Communication Services/Telecommunications/Information Technology firms dropped well below the 2001–2019 average of 6.5 percent to 2.2 percent in 2020 (annualized).

Figure 10: Heat Maps of S&P 500 Securities Litigation™ Percentage of Companies Subject to Core Federal Filings

	Average 2001–2019	2011	2012	2013	2014	2015	2016	2017	2018	2019	2020 (Annualized)
Consumer Discretionary	5.2%	3.8%	4.9%	8.4%	1.2%	0.0%	3.6%	8.5%	10.0%	3.1%	9.5%
Consumer Staples	3.8%	2.4%	2.4%	0.0%	0.0%	5.0%	2.6%	2.7%	11.8%	12.1%	6.1%
Energy/Materials	1.6%	0.0%	2.7%	0.0%	1.3%	0.0%	4.5%	3.3%	1.8%	3.7%	0.0%
Financials/Real Estate	7.7%	1.2%	3.7%	0.0%	1.2%	1.2%	6.9%	3.3%	7.0%	2.0%	6.2%
Health Care	9.1%	2.0%	1.9%	5.7%	0.0%	1.9%	17.9%	8.3%	16.1%	12.9%	10.0%
Industrials	4.2%	1.7%	1.6%	0.0%	4.7%	0.0%	6.1%	8.7%	8.8%	10.1%	2.9%
Communication Services/ Telecommunications/ Information Technology	6.5%	7.1%	3.8%	9.1%	0.0%	4.2%	6.8%	8.5%	12.7%	10.0%	2.2%
Utilities	5.2%	0.0%	0.0%	0.0%	0.0%	3.4%	3.4%	7.1%	7.1%	6.9%	0.0%
All S&P 500 Companies	5.5%	2.6%	3.0%	3.4%	1.2%	1.6%	6.6%	6.4%	9.4%	7.2%	4.8%



Note:

1. The figure is based on the composition of the S&P 500 as of the last trading day of the previous year.
2. Sectors are based on the Global Industry Classification Standard (GICS).
3. Percentage of Companies Subject to New Filings equals the number of companies subject to new securities class action filings in federal courts in each sector divided by the total number of companies in that sector.
4. In August 2016, GICS added a new industry sector, Real Estate. This analysis begins using the Real Estate industry sector in 2017. In 2018, the Telecommunication Services sector was incorporated into a new sector, Communication Services. This analysis begins using the Communication Services sector name in 2019. With this name change, all companies previously classified as Telecommunication Services and some companies classified as Consumer Discretionary (such as Netflix, Comcast, and CBS) and Information Technology (such as Alphabet and Facebook) were reclassified into the Communication Services sector.

- The percentage of total market capitalization of S&P 500 companies subject to core federal filings fell from 10.0 percent in 2019 to 4.0 percent in 2020 (annualized), the third-lowest percentage since 2001. This represents a decrease of 60.1 percent from the previous year. See Appendix 2B for market capitalization percentages by sector from 2001 to 2019.
- Companies in the Consumer Discretionary and Financials/Real Estate sectors subject to core federal filings more than doubled relative to 2019, but the percentage of these sectors' market capitalization grew by nearly six times year-over-year.
- All sectors other than Consumer Discretionary and Financials/Real Estate saw a decrease in the percentage of market capitalization subject to core federal filings compared with 2019.

*In six of the eight industry sectors, the percentage of market capitalization subject to core federal filings fell from the previous year.*

**Figure 11: Heat Maps of S&P 500 Securities Litigation™ Percentage of Market Capitalization Subject to Core Federal Filings**

	Average 2001–2019	2011	2012	2013	2014	2015	2016	2017	2018	2019	2020 (Annualized)
Consumer Discretionary	4.8%	4.6%	1.6%	4.4%	2.5%	0.0%	2.8%	8.2%	4.7%	0.5%	3.4%
Consumer Staples	4.4%	0.8%	14.0%	0.0%	0.0%	1.9%	1.0%	6.7%	15.2%	9.1%	3.5%
Energy/Materials	2.8%	0.0%	0.9%	0.0%	0.2%	0.0%	19.8%	2.3%	1.4%	1.2%	0.0%
Financials/Real Estate	14.3%	6.9%	11.0%	0.0%	0.3%	3.0%	11.9%	1.5%	12.5%	2.2%	13.6%
Health Care	12.3%	0.7%	0.8%	4.4%	0.0%	3.1%	13.2%	2.7%	26.3%	6.6%	5.5%
Industrials	9.3%	2.1%	1.2%	0.0%	1.7%	0.0%	8.7%	22.3%	19.4%	21.6%	2.3%
Communication Services/ Telecommunications/ Information Technology	10.4%	13.4%	2.2%	16.6%	0.0%	7.0%	12.3%	4.4%	19.4%	18.0%	0.6%
Utilities	6.1%	0.0%	0.0%	0.0%	0.0%	3.7%	4.4%	9.6%	6.5%	7.9%	0.0%
<b>All S&amp;P 500 Companies</b>	<b>9.0%</b>	<b>5.0%</b>	<b>4.3%</b>	<b>4.7%</b>	<b>0.6%</b>	<b>2.8%</b>	<b>10.0%</b>	<b>6.1%</b>	<b>14.9%</b>	<b>10.0%</b>	<b>4.0%</b>



**Note:**

1. The figure is based on the composition of the S&P 500 as of the last trading day of the previous year.
2. Sectors are based on the Global Industry Classification Standard (GICS).
3. Percentage of Market Capitalization Subject to New Filings equals the market capitalization of companies subject to new securities class action filings in federal courts in each sector divided by the total market capitalization of companies in that sector.
4. In August 2016, GICS added a new industry sector, Real Estate. This analysis begins using the Real Estate industry sector in 2017. In 2018, the Telecommunication Services sector was incorporated into a new sector, Communication Services. This analysis begins using the Communication Services sector name in 2019. With this name change, all companies previously classified as Telecommunication Services and some companies classified as Consumer Discretionary (such as Netflix, Comcast, and CBS) and Information Technology (such as Alphabet and Facebook) were reclassified into the Communication Services sector.

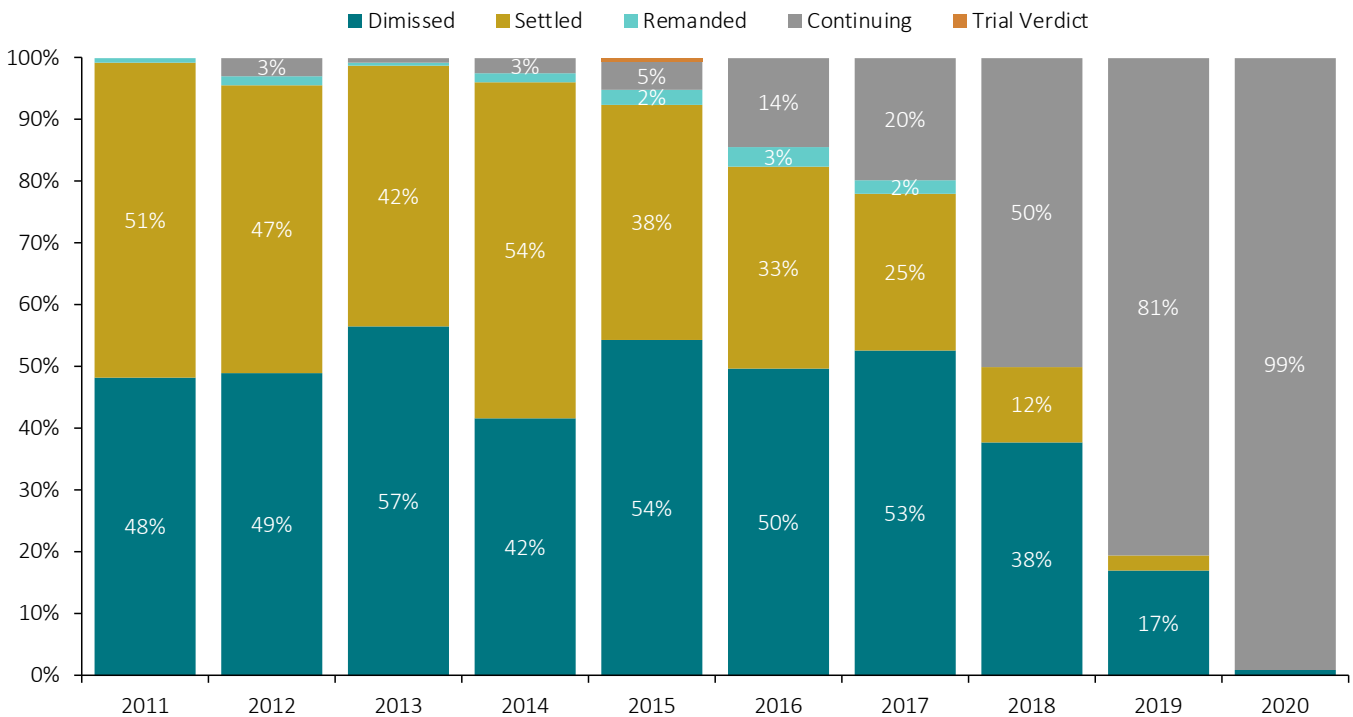
# Status of Federal Securities Class Action Filings

This analysis compares filing groups to determine whether filing outcomes have changed over time. As each cohort ages, a larger percentage of filings are resolved—whether through dismissal, settlement, remand, or trial verdict.

*Since 2015, dismissal rates for core federal filings have exceeded 50 percent for cohort years in which litigation has been substantially resolved.*

- From 1997 to 2018, 50 percent of core federal filings were settled, 44 percent were dismissed, less than 1 percent were remanded, and 5 percent are continuing. Overall, less than 1 percent of core federal filings have reached a trial verdict.
- In the last 10 years, the cohorts with the most divergent dismissal rates—where litigation has been substantially resolved—were 2013 (at 57 percent) and 2014 (at 42 percent).

Figure 12: Status of Filings by Year—Core Federal Filings 2011–2020 H1



Note: Percentages may not sum to 100 percent due to rounding.



# 1933 Act Cases Filed in State Courts

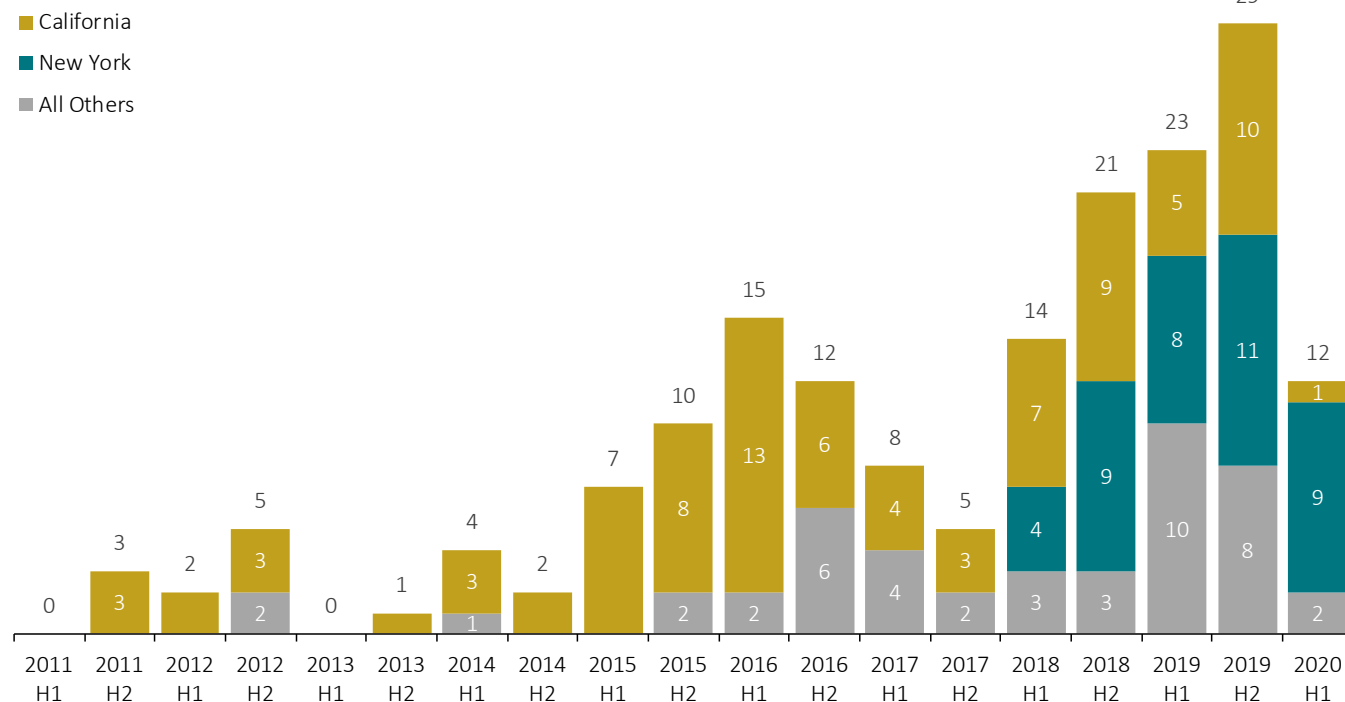
The following data include 1933 Act filings in California, New York, and other state courts. The figure below illustrates all the filings currently in the dataset. Filings from prior years are added retrospectively when identified.

- The number of state 1933 Act filings in the first half of 2020 is lower than the past four semiannual periods, despite generally trending upward over the past six years.
- There was only one 1933 Act filing in California state court (which also had a parallel filing in federal court). The first half of 2020 had the fewest number of California 1933 Act state-court filings since 2013 H2.

- The Technology and Consumer Non-Cyclical sectors made up 67 percent of 1933 Act filings in the first half of 2020.
- In the first half of 2020, 83 percent of 1933 Act filings were against foreign companies, and 50 percent were against Chinese companies.

*Filing activity of 1933 Act claims declined modestly in New York but dropped sharply in other states including California.*

**Figure 13: State 1933 Act Filings by State 2011 H1–2020 H1**



Source: Stanford Law School and Securities Class Action Clearinghouse; Bloomberg Law; Institutional Shareholder Services’ Securities Class Action Services (ISS’ SCAS)

Note:

1. “All Others” contains filings in Alabama, Arizona, Colorado, Florida, Georgia, Illinois, Iowa, Massachusetts, Michigan, Nevada, New Hampshire, New Jersey, Oregon, Pennsylvania, Rhode Island, Tennessee, Texas, Washington, West Virginia, and Wisconsin.
2. Beginning in 2018, California state filings may contain either Section 11 or Section 12 claims. Of the 16 filings in California in 2018, six filings contained Section 12 claims without also containing Section 11 claims.

# Dollar Loss on Offered Shares Index™ (DLOS Index™)

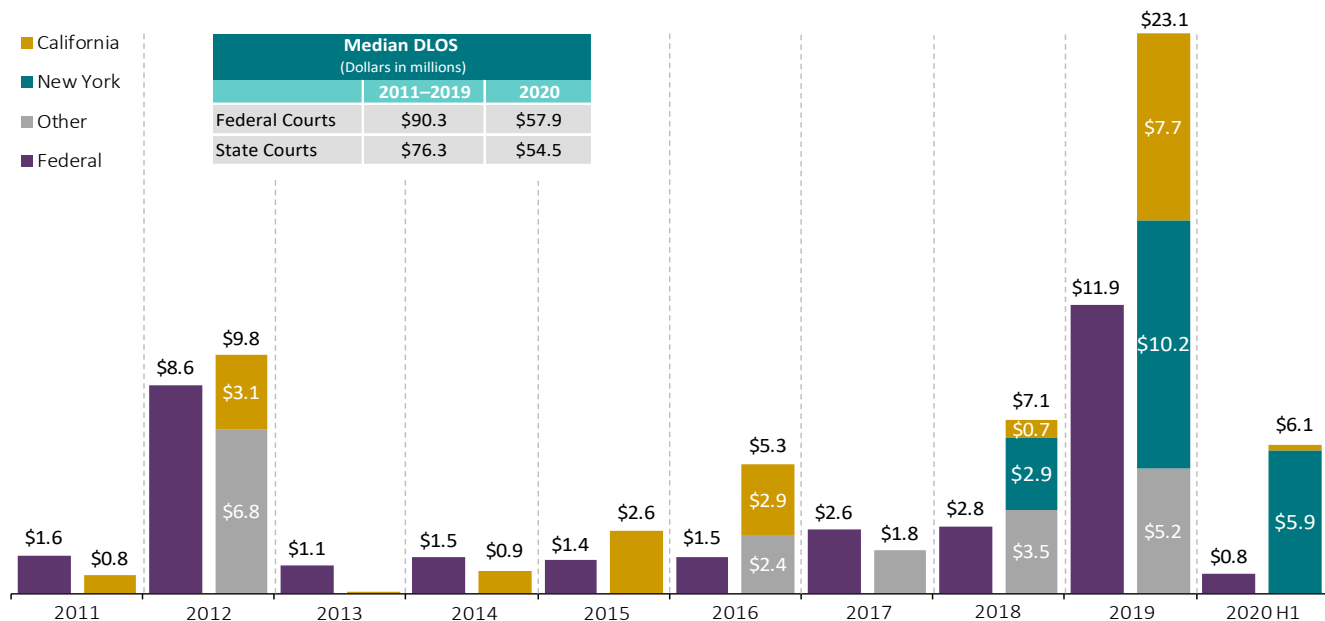
This index measures the aggregate Dollar Loss on Offered Shares (DLOS) for federal Section 11–only filings and 1933 Act cases filed in state courts. This analysis calculates the loss in market value of shares purchased in securities issuances that became subject to 1933 Act or Section 11 claims. It is calculated as the number of shares offered in the issuance (e.g., in an IPO, a seasoned equity offering (SEO), or a corporate merger or spin-off) acquired by class members, multiplied by the difference between the offering price of the shares and their price on the complaint filing date.

This alternative measure of losses has been calculated for federal filings involving only Section 11 claims (i.e., no Section 10b claims) and 1933 Act filings in state courts. DLOS aims to capture more precisely than MDL the dollar loss associated with the specific shares at issue as alleged in a complaint. See the Glossary for additional discussion of market capitalization losses and DLOS.

*The DLOS Index for filings in New York state courts greatly exceeded that in all other state courts.*

- Filings in New York made up 96 percent of state DLOS the first half of 2020. This continues a trend of an increasing percentage of DLOS being attributable to New York cases, with 41 percent in 2018 and 44 percent in 2019.

Figure 14: Dollar Loss on Offered Shares Index™ (DLOS Index™) for Federal Section 11–Only and State 1933 Act Filings 2011–2020 H1  
(Dollars in billions)



Source: Stanford Law School and Securities Class Action Clearinghouse; Bloomberg Law; ISS' SCAS; CRSP; SEC EDGAR

Note: Federal filings included in this analysis must contain a Section 11 claim and may contain a Section 12 claim, but do not contain Section 10b claims. Beginning in 2018, California state filings may contain either Section 11 or Section 12 claims. Of the 16 filings in California in 2018, six filings contained Section 12 claims without also containing Section 11 claims.

# Federal Section 11 Filings and State 1933 Act Filings—Pre- and Post-Cyan

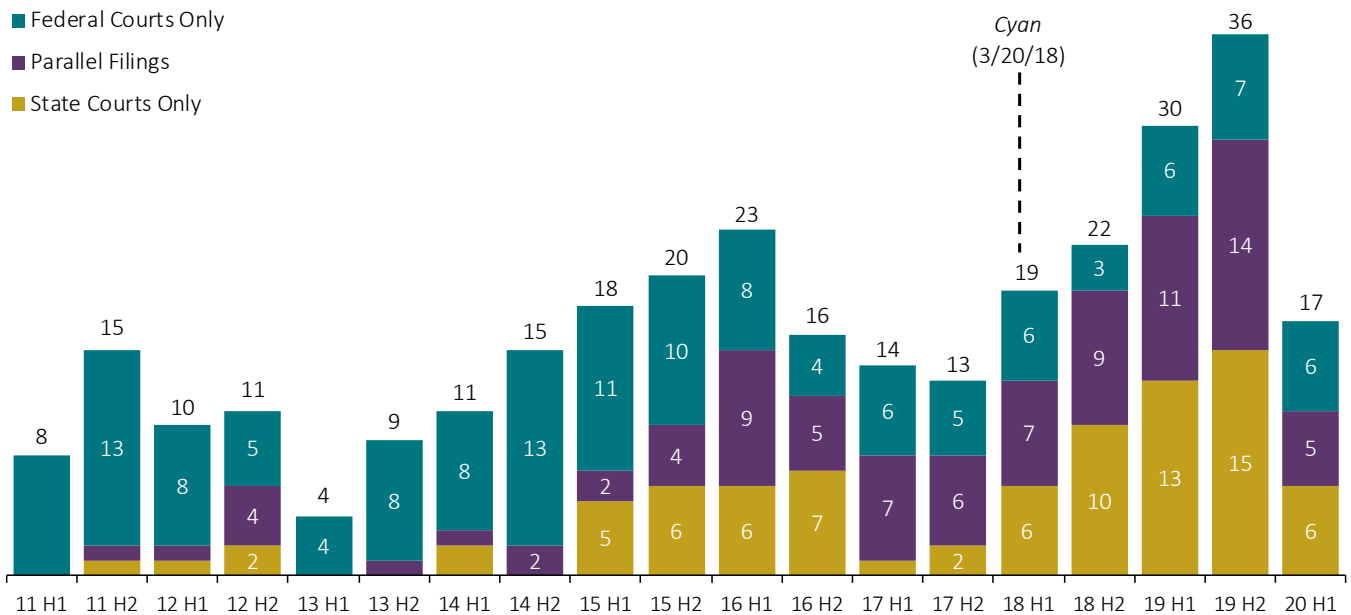
The figure below is a combined measure of Section 11 filing activity in federal courts and 1933 Act filings in state courts.

- In the first half of 2020, the combined number of federal Section 11 filings and state 1933 Act filings was 17, comprising five parallel filings, six state-only filings, and six federal-only filings.
- Federal Section 11 and state 1933 Act filing activity in the first half of 2020 was significantly slower than in the prior semiannual period. The decline in these types of filings was the primary reason for the lower level of filings observed in the first half of the year.

*State 1933 Act filings decreased for the first time since the Cyan decision, falling 62 percent from levels in the second half of 2019.*

- Only 18 percent of 1933 Act filings were against U.S.-headquartered companies. In contrast, 67 percent of federal-only Section 11 filings were against U.S. companies.

**Figure 15: Pre- and Post-Cyan Semiannual Federal Section 11 and State 1933 Act Filings 2011 H1–2020 H1**



Source: Stanford Law School and Securities Class Action Clearinghouse; Bloomberg Law; ISS' SCAS

Note:

1. The federal Section 11 filings displayed may include Rule 10b-5 claims, but state 1933 Act filings do not.
2. Section 11 filings in federal courts may include parallel (or related) cases filed in state courts. When these cases are filed in different semiannual periods, the earliest filing is counted. If filings against the same company are brought in different states in addition to a filing brought in federal court, the parallel filing is counted as a unique case and the state-only filing is treated as a unique case. Filings against the same company brought in different states without a parallel filing brought in federal court are counted as unique state filings.
3. Beginning in 2018, California state filings may contain either Section 11 or Section 12 claims. Of the 16 filings in California in 2018, six filings contained Section 12 claims without also containing Section 11 claims.

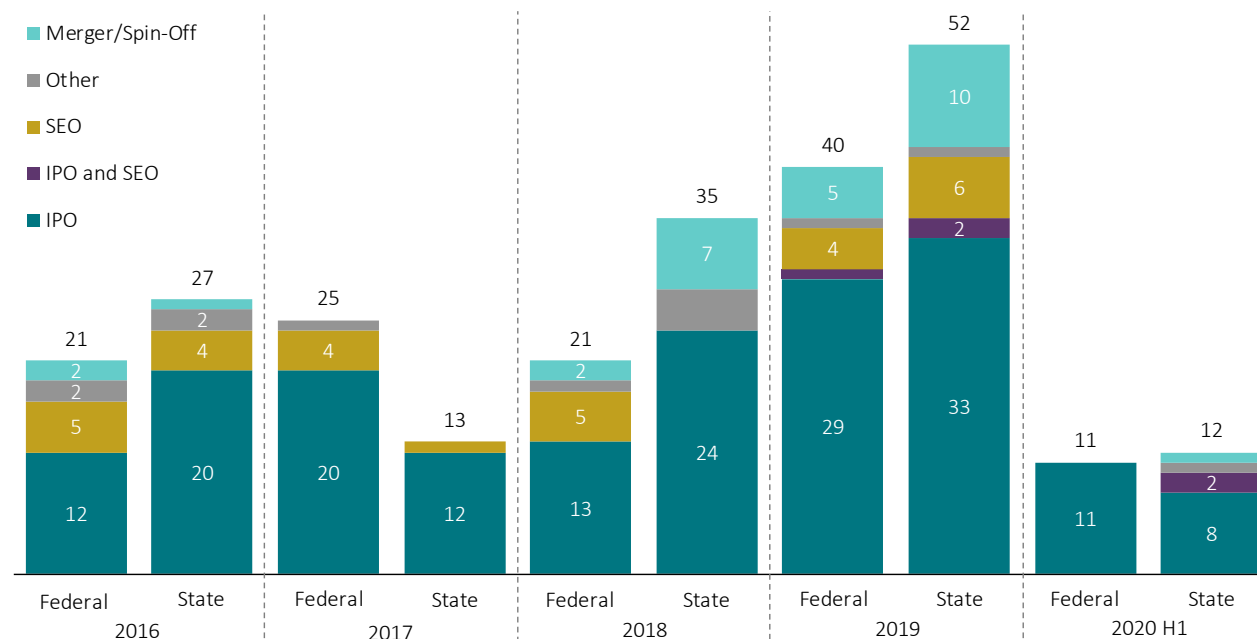
# Type of Security Issuance Underlying Federal Section 11 and State 1933 Act Filings

The figure below illustrates Section 11 claims in federal courts and 1933 Act claims in state courts based on the type of security issuance underlying the lawsuit.

*Claims based on IPO issuances were predominant in the first half of 2020, unlike recent years when other types of issuances (merger/spin-offs and SEOs) underlying the litigation were increasing.*

- In the first half of 2020, there were no filings related to SEO-only issuances and only one related to mergers or spin-offs, which is contrary to the trend observed in the last two years, particularly in state courts.
- There were two state court filings based on both an IPO and an SEO in the first half of 2020; the first of such filings appeared in 2019.

Figure 16: Federal Section 11 and State 1933 Act Class Action Filings by Type of Security Issuance 2016–2020 H1



Source: Stanford Law School and Securities Class Action Clearinghouse; Bloomberg Law; ISS' SCAS

Note:

1. The federal Section 11 data displayed may contain Rule 10b-5 claims, but state 1933 Act filings do not. For this analysis, because state and federal filings are considered separately without accounting for parallel filings, counts may differ from those in other figures.
2. Beginning in 2018, California state filings may contain either Section 11 or Section 12 claims. Of the 16 filings in California in 2018, six filings contained Section 12 claims without also containing Section 11 claims.
3. There was one federal court filing in 2019 related to both a merger-related issuance and SEO. This analysis categorizes this filing as relating to a merger-related issuance to avoid double-counting.

# Combined Federal and State Filing Activity—Highlighting Federal Section 11 and State 1933 Act Filings

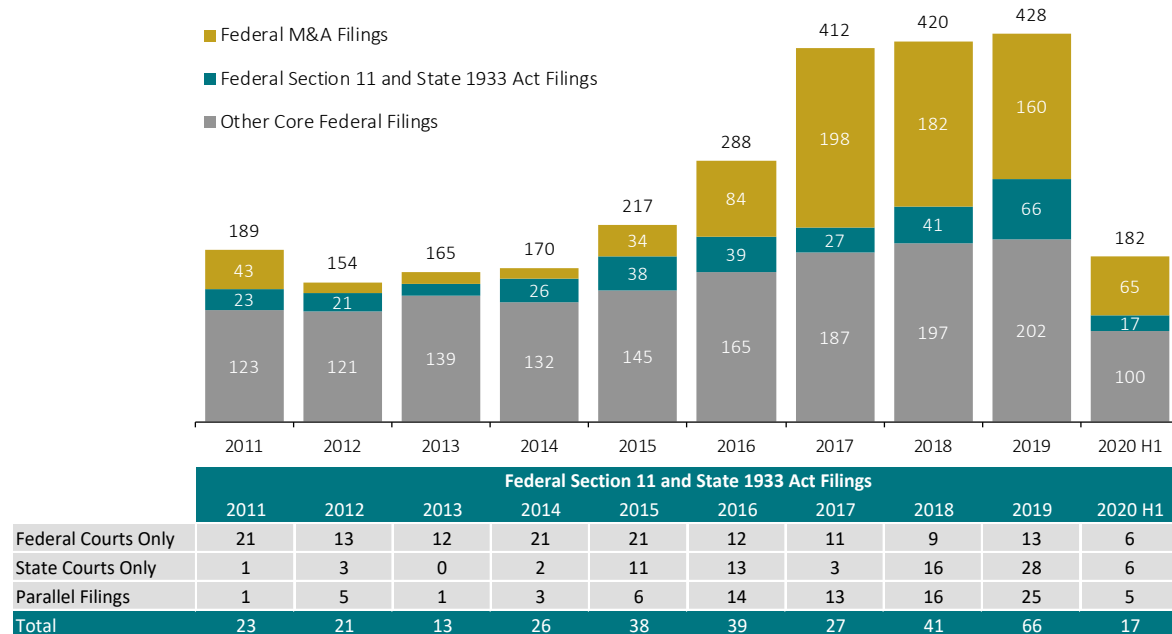
This analysis highlights federal Section 11 claims, state 1933 Act filings, and the extent to which parallel actions have been filed.

- The decline in Section 11 and 1933 Act filings in the first half of 2020 was driven by a steep decline in state court-only and parallel filings. State court-only filings and parallel filings were only 21 percent and 20 percent of 2020 values, respectively.

- Other core federal filings—those excluding Section 11 and state 1933 Act filings—were comparable on an annualized basis to levels in 2018 and 2019.

*The number of Section 11 and state 1933 Act filings in the first half of 2020 was roughly a quarter of the number of such filings in 2019.*

Figure 17: Federal Section 11 and State 1933 Act Class Action Filings by Venue 2011–2020 H1



Source: Stanford Law School and Securities Class Action Clearinghouse; Bloomberg Law; ISS' SCAS

Note:

- The federal Section 11 data displayed may contain Rule 10b-5 claims, but state 1933 Act filings do not.
- Section 11 filings in federal courts may include parallel (or related) cases filed in state courts. When these cases are filed in different years, the earliest filing is counted. If filings against the same company are brought in different states in addition to a filing brought in federal court, the parallel filing is counted as a unique case and the state-only filing is treated as a unique case. Filings against the same company brought in different states without a parallel filing brought in federal court are counted as unique state filings. Accordingly, counts that include parallel filings may differ from counts of state filings because a parallel filing may be counted in a prior year.
- Beginning in 2018, California state filings may contain either Section 11 or Section 12 claims. Of the 16 filings in California in 2018, six filings contained Section 12 claims without also containing Section 11 claims.

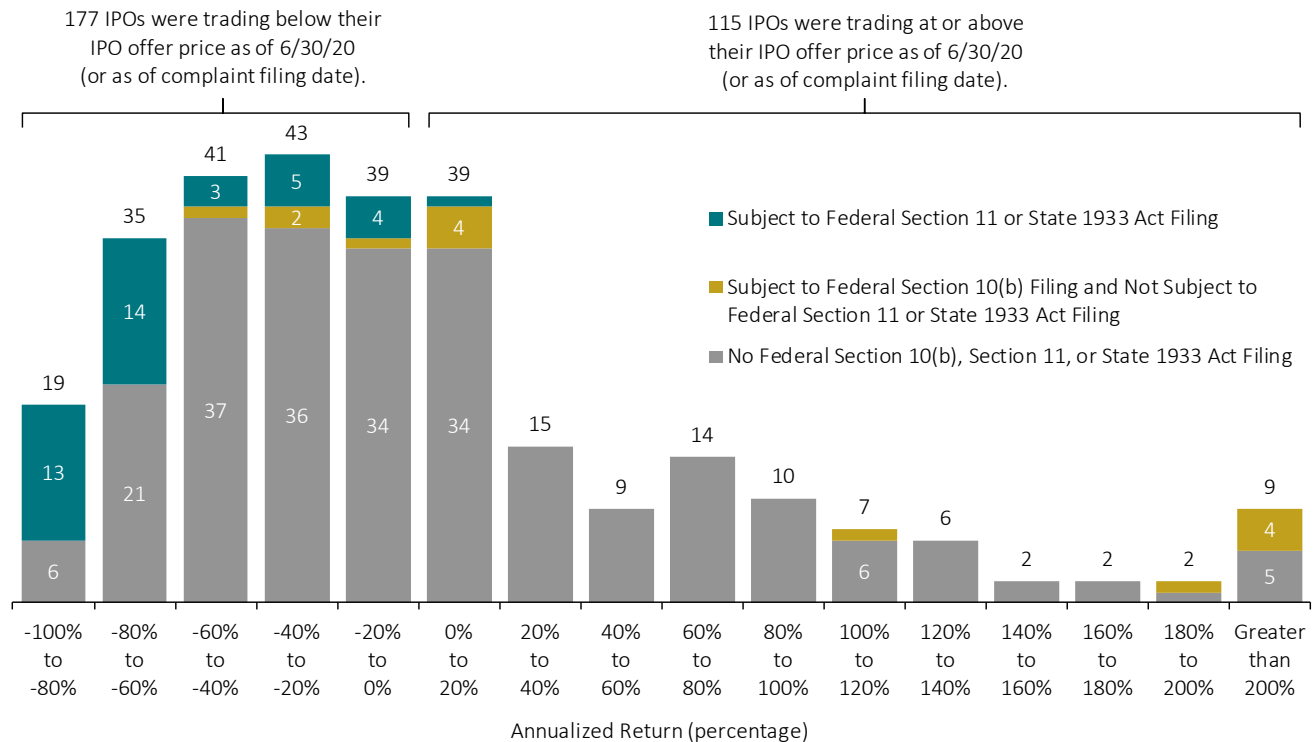
# New: Performance of Recent IPOs

This analysis explores the relationship between a company's performance following its IPO and the degree to which these companies were the subject of a federal Section 11, state 1933 Act filing, or federal Section 10(b) filing. IPOs from January 2018 to June 2019 are analyzed. The performance of these IPOs is evaluated through June 2020.

*40 out of 299 (13 percent) companies that undertook an IPO between January 2018 and June 2019 were later subject to a federal Section 11 or state 1933 Act filing.*

- Post-IPO performance indicates that 59 percent of all companies that undertook an IPO since January 2018 were trading below their IPO offer price at the time of their complaint or as of June 30, 2020. Seven companies were delisted as of June 30, 2020.
- Perhaps not surprisingly, companies with poorer post-IPO returns were more likely to be the target of a federal Section 11 or state 1933 Act filing.
- Nearly all (39 out of 40) companies that were subject to a federal Section 11 or state 1933 Act filing were trading below their IPO offer price as of the complaint filing date.

**Figure 18: Performance of Recent IPOs 2018–2019 H1**



Source: Nasdaq; Bloomberg Law; ISS' SCAS; Refinitiv Eikon

Note:

1. IPOs examined exclude special-purpose acquisition companies, blank-check companies, and companies that were delisted or acquired before June 30, 2020. Bars that do not have a data label represent one filing. Companies that were subject to a federal Section 11 filing or state 1933 Act filing have their returns calculated as the most recent closing stock price as of the complaint filing date, divided by the split-adjusted IPO offer price, minus one. Otherwise, returns are calculated as the closing stock price on June 30, 2020, divided by the split-adjusted IPO offer price, minus one. Returns are then annualized using the following formula:  $\text{annualized return} = (1 + \text{nominal return})^{1 / \text{return period in years}}$ . For simplicity, this analysis does not account for dividends.
2. Among 734 Section 11 and state 1933 Act filings from January 1997 to June 2014, the lag between the IPO date and the date of a Section 11 filing had a 25th percentile of 6.7 months, median of 12.5 months, and 75th percentile of 22.8 months. The sample is therefore restricted to IPOs before June 30, 2019, one year before the publication of this report, to reflect the median filing lag.

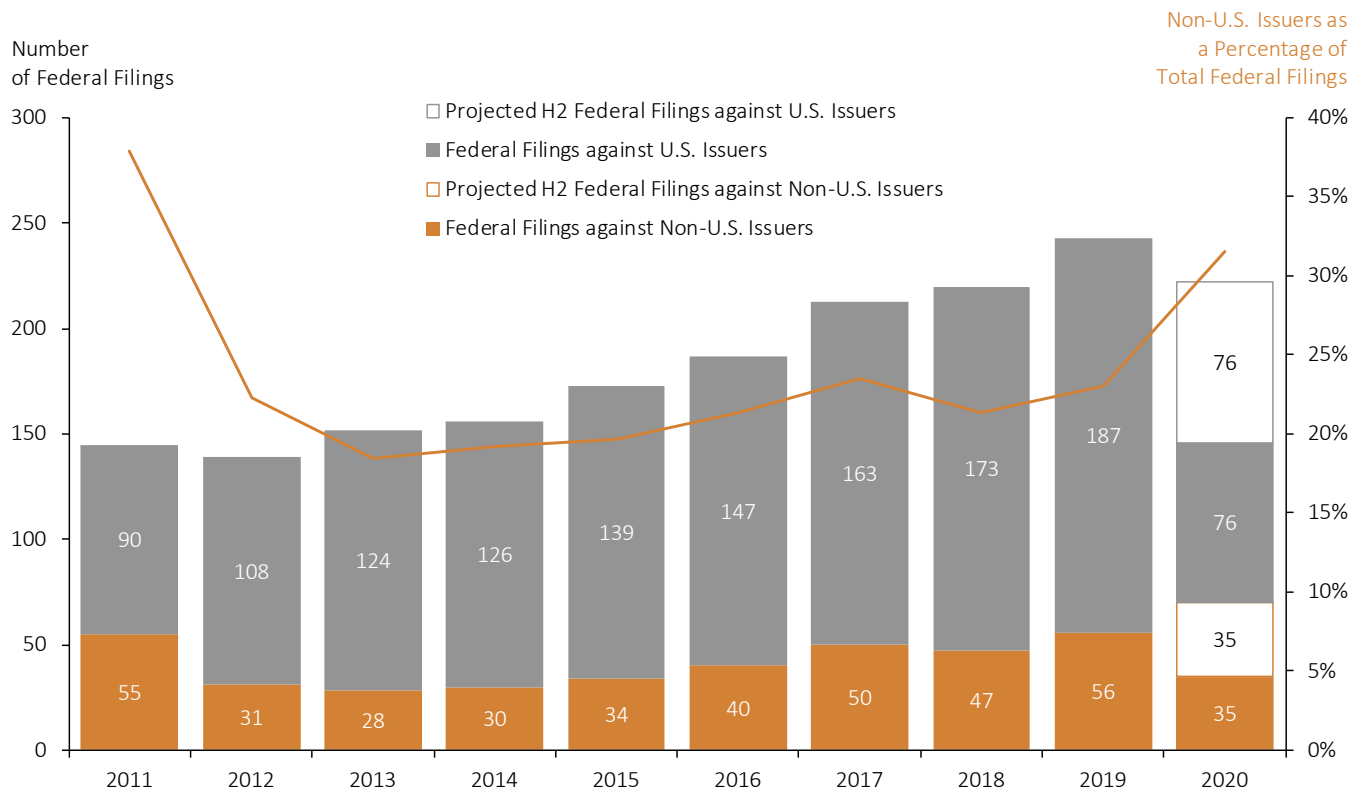
# Federal Filings against Non-U.S. Issuers

This index tracks the number of core federal filings against companies headquartered outside the United States relative to total core federal filings.

- As a percentage of total core federal filings, core federal filings against non-U.S. issuers increased to 31.5 percent, the second-highest rate on record.
- Approximately 20 percent of core federal filings against non-U.S. issuers had allegations related to cryptocurrency.

*Although annualized total core federal filings are down 9 percent, annualized core federal filings against non-U.S. issuers are on pace to be the highest on record.*

Figure 19: Annual Number of Class Action Filings by Location of Headquarters—Core Federal Filings 2011–2020 H1

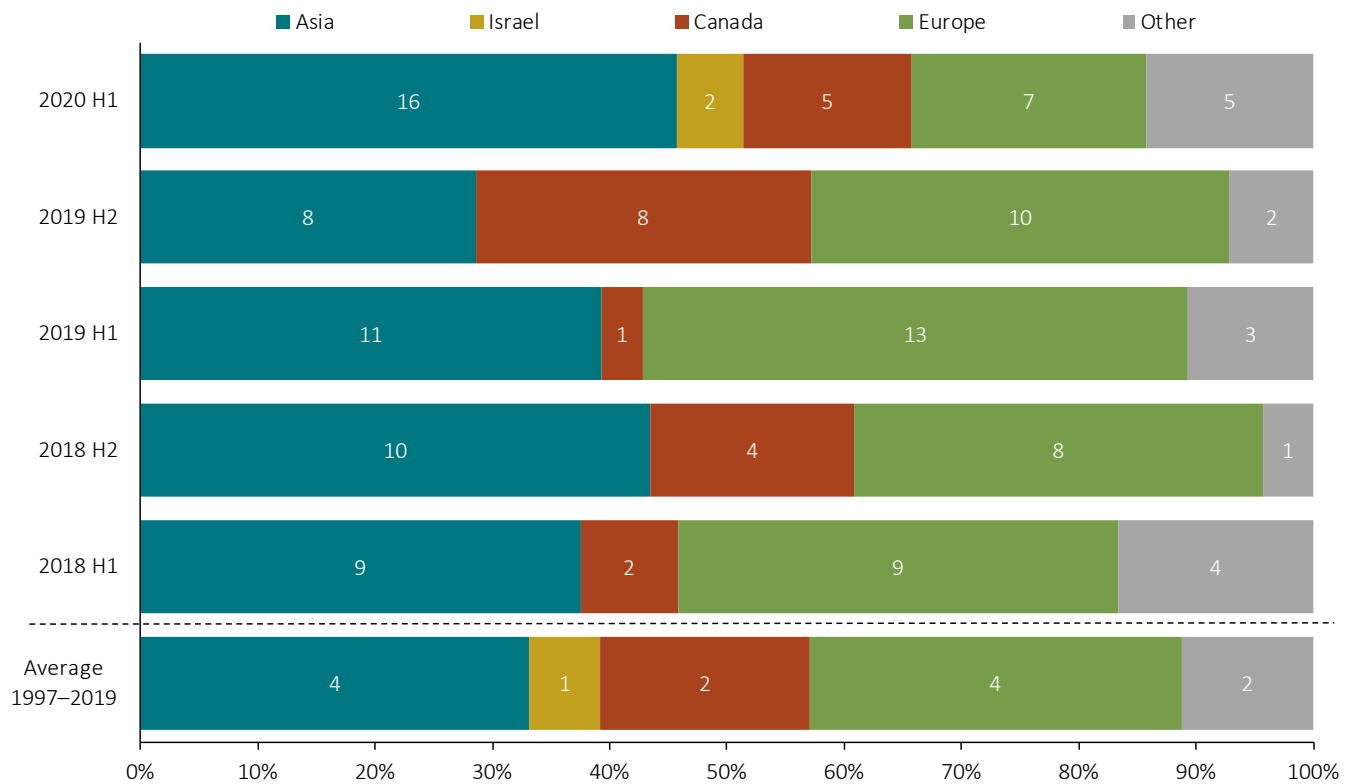


- Of the 16 core filings against Asian firms, 13 were against Chinese firms and three were against Singaporean firms.
- All three core filings against Singaporean firms included allegations related to cryptocurrency.
- Of the five core filings against Canadian companies, three had allegations related to cannabis, continuing the trend of at least one Canadian cannabis filing in each half year since its legalization in Canada in October 2018.

- Israeli firms were subject to filings for the first time since the first half of 2017.
- Core filings against European firms declined to the lowest amount since the first half of 2017.

*There were 16 core federal filings against Asian firms, the most in a half year since 2011 H1.*

Figure 20: Non-U.S. Filings by Location of Headquarters—Core Federal Filings





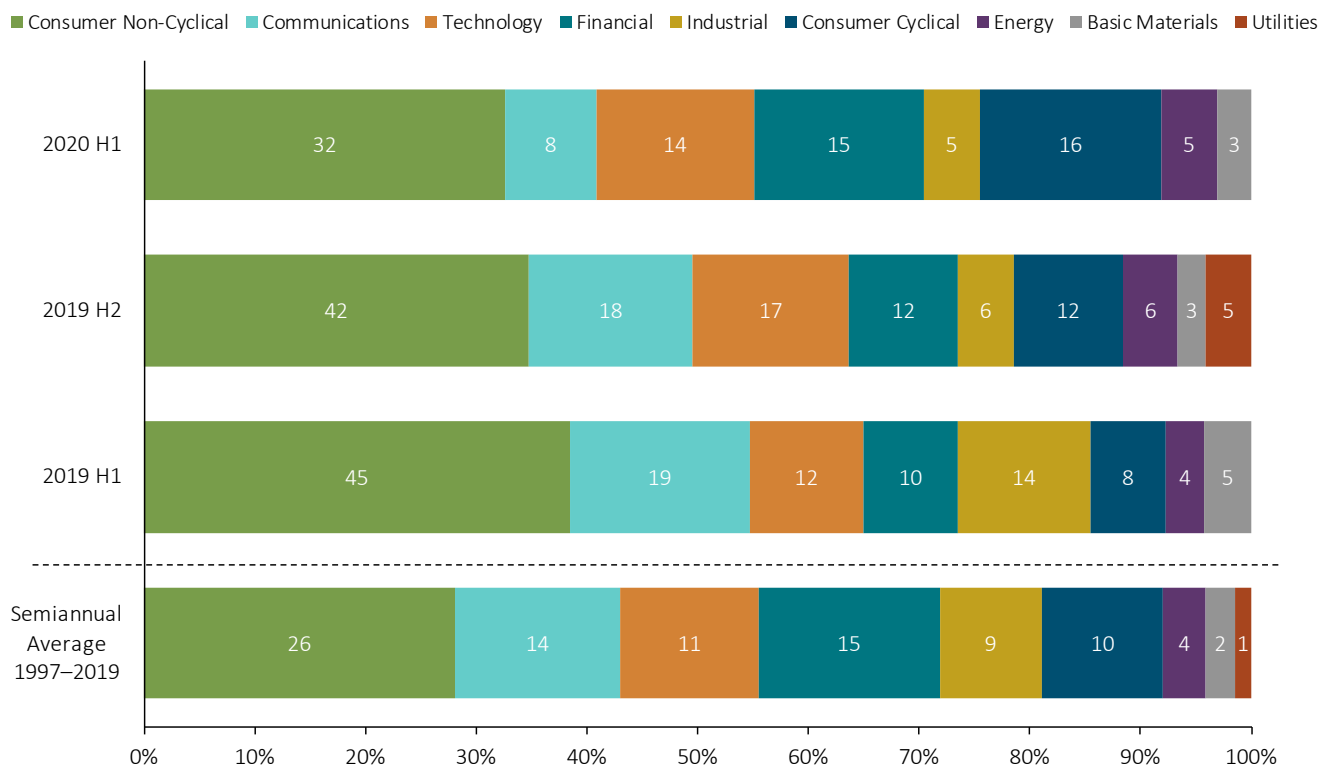
# Industry Comparison of Federal Filings

This analysis of core federal filings encompasses both the large capitalization companies of the S&P 500 and smaller companies.

- Consumer Non-Cyclical continues to be the most common sector with 32 filings. Within this sector, pharmaceutical, biotechnology, and health care comprised 22 filings.
- The Consumer Cyclical sector experienced more activity in the first half of 2020 than it has on average or over both halves of 2019. The MDL for Consumer Cyclical in the first half of 2020 was more than double the historical average.
- The number of Communications filings decreased significantly relative to both halves of 2019 and the 1997–2019 semiannual average. Technology filings also decreased relative to the second half of 2019.

*Consumer Non-Cyclical filings continue to be the most common, while Financial sector filing activity in the first half of 2020 rose relative to the prior year.*

Figure 21: Filings by Industry—Core Federal Filings



Note:

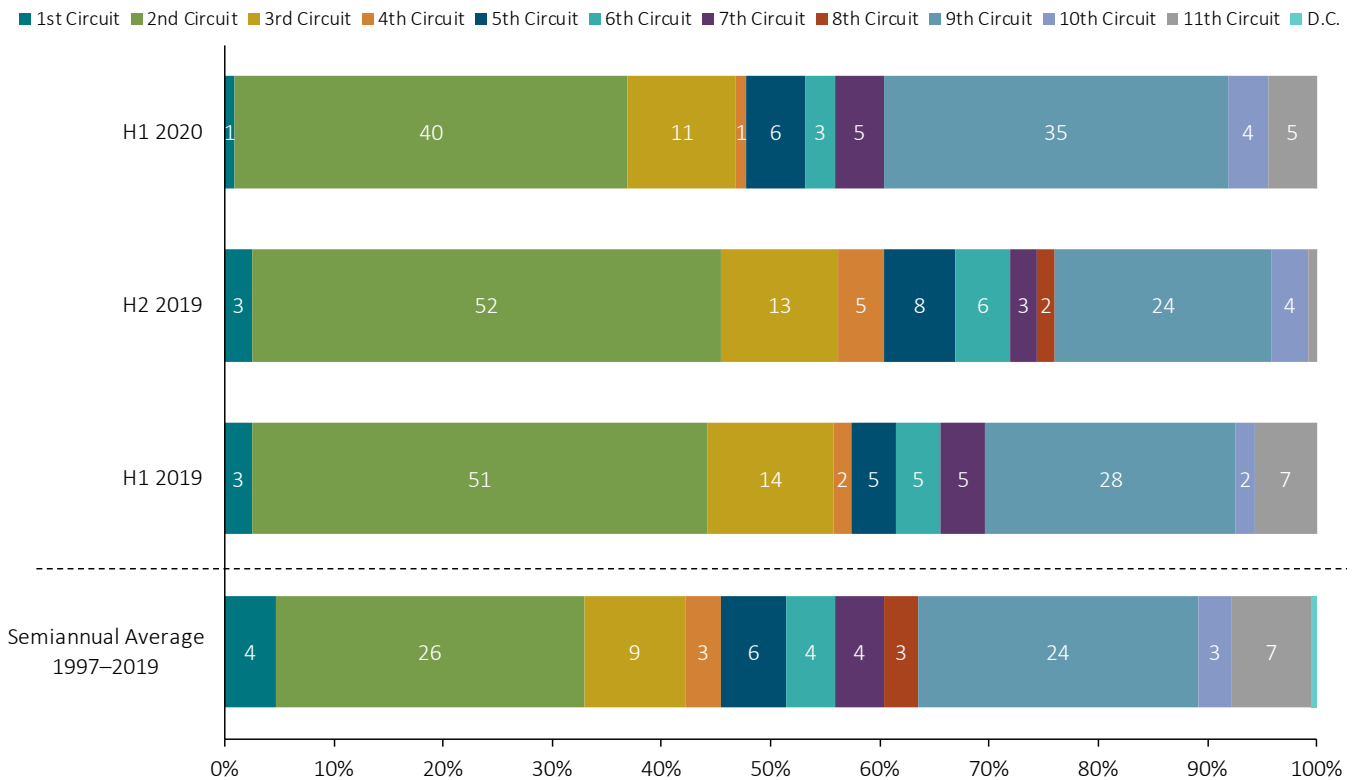
1. Filings with missing sector information or infrequently used sectors may be excluded.
2. Sectors are based on the Bloomberg Industry Classification System.

# Federal Filings by Circuit

- The Second and Ninth Circuits combined made up 68 percent of all core federal filings in the first half of 2020, in line with the first and second halves of 2019 (65 percent and 63 percent, respectively) and above the 1997–2019 semiannual average of 54 percent.
- Core filings in the Second Circuit decreased by 23 percent to 40 filings but still remained higher than the 1997–2019 semiannual average of 26. Core filings in the Ninth Circuit (35) increased by 46 percent relative to the second half of 2019 and to the 1997–2019 semiannual average.
- Core filings in the First, Fourth, Sixth, Eighth, Eleventh, and D.C. Circuits were below their 1997–2019 semiannual averages. At 111, total core federal filings for the first half of 2020 were 19 percent higher than the 1997–2019 historical semiannual average of 93.
- Total MDL for Second Circuit core filings increased from \$118 billion in 2019 H1 to \$227 billion in 2020 H1, a 92 percent increase that was largely driven by a single mega filing. See Appendix 5.

*Core filings in the Ninth Circuit increased 46 percent to 35, its highest point since 2018 H1.*

Figure 22: Filings by Circuit—Core Federal Filings



# New: Most Frequent Plaintiff Counsel on Core Federal Filings

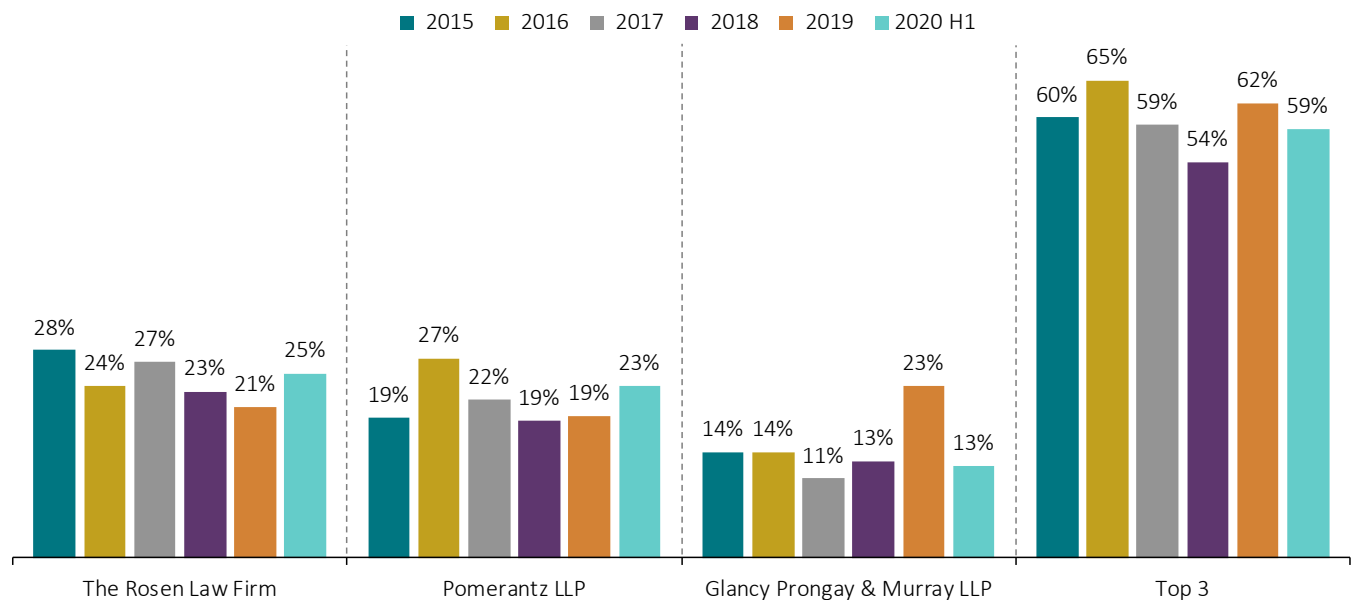
This figure focuses on three law firms—The Rosen Law Firm, Pomerantz LLP, and Glancy Prongay & Murray LLP. These three law firms have been responsible for the majority of first filed securities class action complaints in federal courts in each year since 2015.

- There were 111 core filings in federal courts in the first half of 2020. These plaintiff firms were listed as counsel on 65, or 59 percent, of first identified complaints.
- In each year since 2015, at least 54 percent of first identified complaints have had one of these plaintiff firms listed as counsel.

- While generally Rosen has been responsible for the largest share of first identified complaints, Pomerantz and Glancy had higher shares of first identified complaints in 2016 and 2019, respectively.

*These plaintiff firms were listed as counsel on 59 percent of first identified complaints in the first half of 2020.*

Figure 23: Most Frequent Plaintiff Counsel on Core Federal Filings 2015–2020 H1



Source: Cornerstone Research and Stanford Law School Securities Class Action Clearinghouse

Note:

1. More than one plaintiff law firm can be listed on the first identified complaint. Therefore, the sums of individual filer shares presented may exceed the share of filings involving any one of the top three plaintiff firms.
2. These three firms were the most frequent filers from 2015 through June 2020. It is possible that they were not the three most frequent filers in every year.

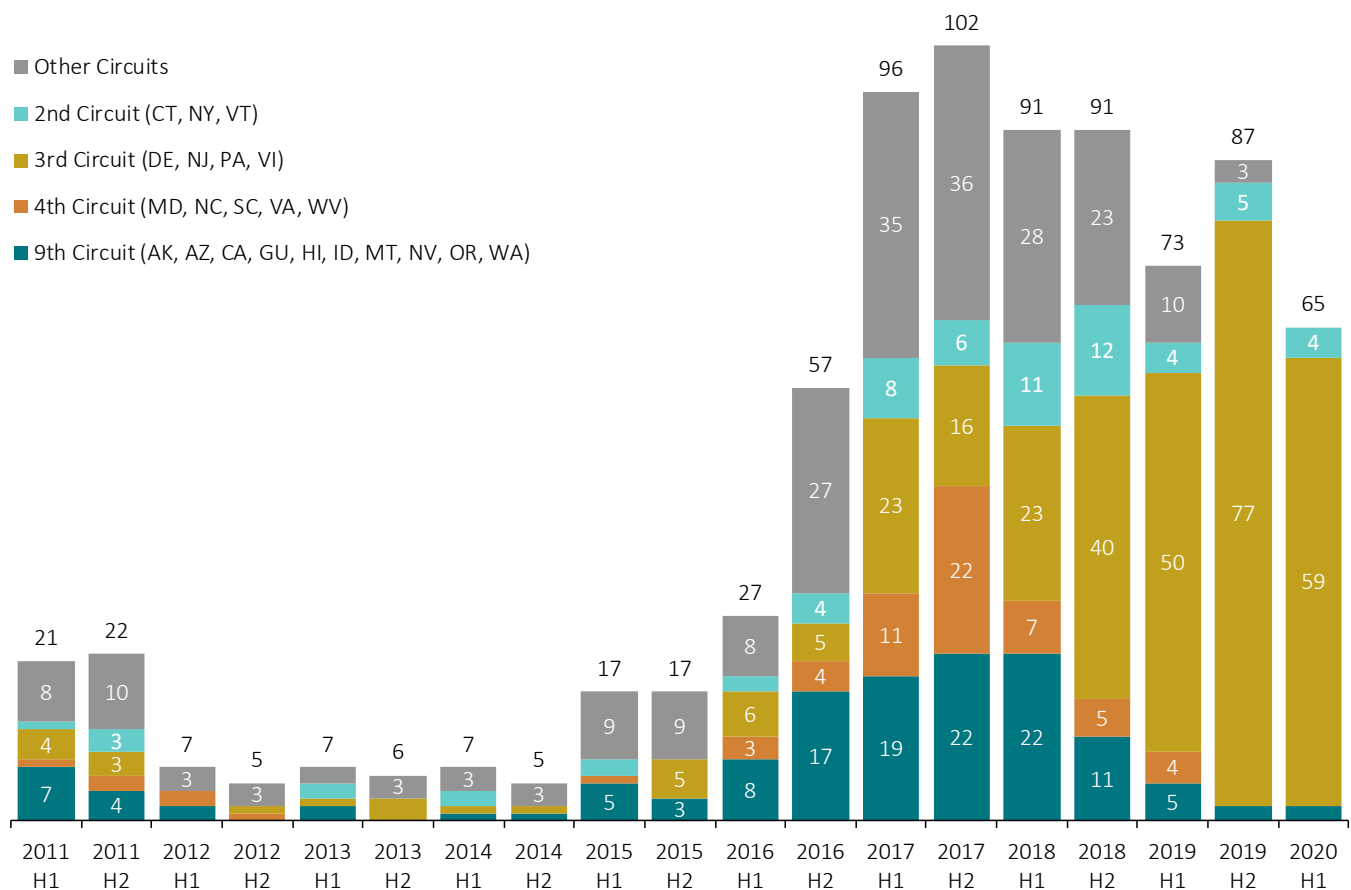
# M&A Filings by Federal Circuit

*All of the M&A filings in the Third Circuit were brought in Delaware courts.*

- There were 65 federal M&A filings in the first half of 2020, the fewest since 2016 H2.

- Filings in the Third Circuit accounted for 91 percent of all M&A filings in the first half of 2020; all of these filings were brought in Delaware federal courts.
- The number of filings in each circuit decreased or remained unchanged relative to the second half of 2019.
- M&A filings represented 84 percent of total filings in the Third Circuit, which was the highest percentage of any circuit.

Figure 24: Semiannual M&A Filings by Federal Circuit 2011 H1–2020 H1



Note:

1. In January 2016, the Delaware Court of Chancery rejected a disclosure-only settlement in Zillow’s acquisition of Trulia. See *In re Trulia Inc. Stockholder Litigation*, 129 A.3d 884 (Del. Ch. 2016). As noted in prior semiannual reports, this decision appears to have resulted in some venue shifting for merger-objection lawsuits from state to federal courts.
2. The Securities Class Action Clearinghouse began tracking M&A filings as a separate category in 2009.

# New: Most Frequent Plaintiff Counsel on M&A Filings

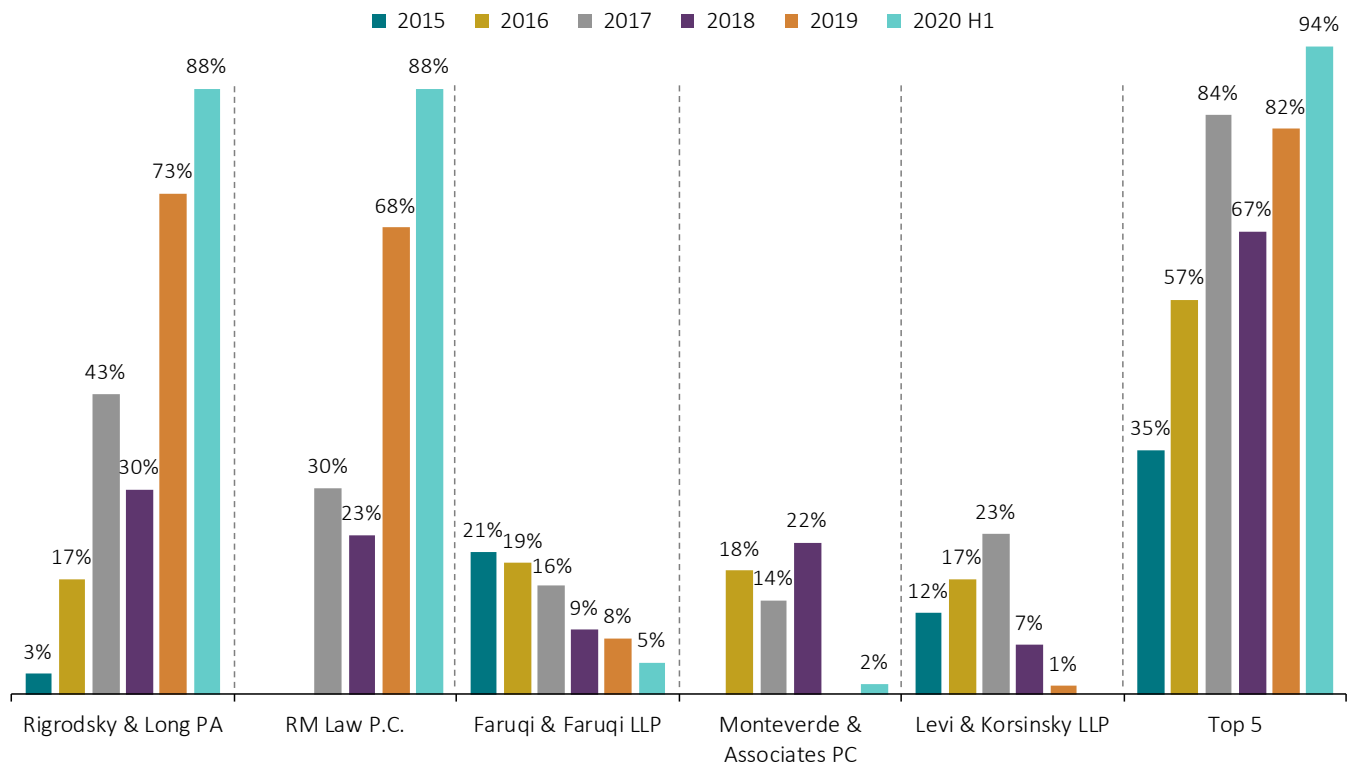
This analysis shows the five most frequent firms listed on first identified M&A complaints against a given company from 2015 through June 2020. Each instance in which they are counsel or co-counsel on a first identified complaint is presented.

- There were 65 M&A filings in federal courts in the first half of 2020. These plaintiff firms were listed as counsel or co-counsel on 61, or 93.8 percent, of first identified complaints.
- Since 2015, at least one of these plaintiff firms has been listed as counsel or co-counsel on 74.7 percent of M&A filings.

*At least one of the top five firms was listed as plaintiff counsel or co-counsel on 94 percent of first identified M&A complaints in the first half of 2020.*

- Rigrodsky & Long PA and RM Law P.C. and have commonly been co-counsel. They were co-counsel on all 57 of their filings in the first half of 2020.

Figure 25: Most Frequent Plaintiff Counsel or Co-counsel on M&A Filings 2015–2020 H1



Source: Cornerstone Research and Stanford Law School Securities Class Action Clearinghouse

Note:

1. These firms are the top five most frequent firms listed on first identified complaints from 2015 through June 2020, not necessarily the five most frequent filers in each year. More than one plaintiff law firm can be listed on the first identified complaint. Therefore, the sums of individual filer shares presented may exceed the share of filings involving any one of the top five plaintiff firms.
2. These five firms were the most frequent filers from 2015 through June 2020. It is possible that they were not the five most frequent filers in every year.

# New Developments

## State Court 1933 Act Claims

On March 18, 2020, the Delaware Supreme Court issued a decision in *Sciabacucchi v. Salzberg*. At issue was whether forum-selection provisions in corporate charters could require that some class action securities claims under the 1933 Act be adjudicated in federal courts. This decision reversed a December 2018 opinion of the Delaware Chancery Court that such charter provisions were invalid under Delaware law.

In recent years, multiple companies chartered in Delaware have adopted forum-selection provisions dictating that 1933 Act claims be adjudicated in federal rather than Delaware state courts. In the wake of the March 2018 U.S. Supreme Court ruling in *Cyan*—which confirmed that state courts have concurrent jurisdiction over 1933 Act claims and required federal courts to remand 1933 Act claims that had been removed to federal court—even more companies adopted federal forum-selection provisions.

Key questions to be resolved include whether states other than Delaware will enforce federal forum-selection provisions and whether corporate charters can require arbitration of internal corporate claims, including those involving violations of securities laws.

## Legislation Prohibiting Listing of Securities of Companies in Jurisdictions That Restrict PCAOB Inspections

There were more than 150 China-based companies with a combined market value of \$1.2 trillion listed on U.S. exchanges at the end of 2019. Although those companies filed financial statements that were audited by firms registered with the PCAOB, China prevents the PCAOB from inspecting the audits of those companies. Restrictions on PCAOB inspections are also in place in France and Belgium. Regulators and policymakers have raised concerns that these restrictions present significant risks to investors.

The Senate, the President, and Nasdaq have recently taken action to address these concerns. The Senate passed the Holding Foreign Companies Accountable Act to prohibit securities from being listed on U.S. securities exchanges or traded over-the-counter if a company's auditor has not been inspected by the PCAOB for three consecutive years. The President ordered the President's Working Group on Financial Markets (PWG) to recommend actions that the SEC or a federal agency or department should take to protect investors, including setting new rules for listing on U.S. securities exchanges. Nasdaq proposed a rule to deny listing to companies if the PCAOB cannot inspect the auditor, if the auditor has not been subject to an inspection, or when the auditor does not demonstrate sufficient resources, geographic reach, or experience.

Research has shown that delisting results in significant stock price declines, in the range of 30 percent or larger.<sup>1</sup> Therefore, the pending legislation to delist securities of companies in jurisdictions that restrict PCAOB inspections could increase securities litigation.

1. J. Macey, M. O'Hara, and D. Pompilio, "Down and Out in the Stock Market: The Law and Economics of the Delisting Process," *Journal of Law and Economics* 51, no. 4 (2008): 683–713; W. Beaver, M. McNichols, and R. Price, "Delisting Returns and Their Effect on Accounting-Based Market Anomalies," *Journal of Accounting and Economics* 43 (2007): 341–368.

# Glossary

**Annual Number of Class Action Filings by Location of Headquarters** (formerly known as the Class Action Filings Non-U.S. Index) tracks the number of core filings against non-U.S. issuers (companies headquartered outside the United States) relative to total core filings.

**Class Action Filings Index® (CAF Index®)** tracks the number of federal securities class action filings.

**Cohort** is the group of securities class actions all filed in a particular calendar year.

**Core filings** are all federal and state 1933 Act securities class actions excluding those defined as M&A filings.

**Cyan** refers to *Cyan Inc. v. Beaver County Employees Retirement Fund*. In this March 2018 opinion, the U.S. Supreme Court ruled that 1933 Act claims may be brought to state venues and are not removable to federal court.

**Disclosure Dollar Loss Index® (DDL Index®)** measures the aggregate DDL for all federal and state filings over a period of time. DDL is the dollar value change in the defendant firm's market capitalization between the trading day immediately preceding the end of the class period and the trading day immediately following the end of the class period. DDL should not be considered an indicator of liability or measure of potential damages. Instead, it estimates the impact of all information revealed at the end of the class period, including information unrelated to the litigation.

**Dollar Loss on Offered Shares Index™ (DLOS Index™)** measures the aggregate DLOS for federal filings with only Section 11 claims and for state 1933 Act filings. DLOS is the change in the dollar value of shares acquired by class members. It is the difference in the price of offered shares (i.e., from offering until the complaint filing date) multiplied by the shares offered. DLOS should not be considered an indicator of liability or measure of potential damages. Instead, it estimates the impact of all information revealed between the IPO date and the complaint filing date, including information unrelated to the litigation.

**Filing lag** is the number of days between the end of a class period and the filing date of the securities class action.

**First identified complaint** is the first complaint filed of one or more securities class action complaints with the same underlying allegations filed against the same defendant or set of defendants.

**Heat Maps of S&P 500 Securities Litigation™** analyze securities class action activity by industry sector. The analysis focuses on companies in the Standard & Poor's 500 (S&P 500) index, which comprises 500 large, publicly traded companies in all major sectors. Starting with the composition of the S&P 500 at the beginning of each year, the Heat Maps examine each sector by: (1) the percentage of these companies subject to new securities class actions in federal court during each calendar year, and (2) the percentage of the total market capitalization of these companies subject to new securities class actions in federal court during each calendar year.

**Market capitalization losses** measure changes to market values of the companies subject to class action filings. This report tracks market capitalization losses for defendant firms during and at the end of class periods. They are calculated for publicly traded common equity securities, closed-ended mutual funds, and exchange-traded funds where data are available. Declines in market capitalization may be driven by market, industry, and/or firm-specific factors. To the extent that the observed losses reflect factors unrelated to the allegations in class action complaints, indices based on class period losses would not be representative of potential defendant exposure in class actions. This is especially relevant in the post-*Dura* securities litigation environment. In April 2005, the U.S. Supreme Court ruled that plaintiffs in a securities class action are required to establish a causal connection between alleged wrongdoing and subsequent shareholder losses. This report tracks market capitalization losses at the end of each class period using DDL, and market capitalization losses during each class period using MDL.

**Maximum Dollar Loss Index® (MDL Index®)** measures the aggregate MDL for all federal and state filings over a period of time. MDL is the dollar value change in the defendant firm's market capitalization from the trading day with the highest market capitalization during the class period to the trading day immediately following the end of the class period. MDL should not be considered an indicator of liability or measure of potential damages. Instead, it estimates the impact of all information revealed during or at the end of the class period, including information unrelated to the litigation.

**Mega filings** include mega DDL filings, securities class action filings with a DDL of at least \$5 billion; and mega MDL filings, securities class action filings with an MDL of at least \$10 billion.

**Merger and acquisition (M&A) filings** are securities class actions filed in federal courts that have Section 14 claims, but no Rule 10b-5, Section 11, or Section 12(2) claims, and involve merger and acquisition transactions.

**Securities Class Action Clearinghouse** is an authoritative source of data and analysis on the financial and economic characteristics of federal securities fraud class action litigation, cosponsored by Cornerstone Research and Stanford Law School.

**State 1933 Act filing** is a class action filed in a state court that asserts claims under Section 11 and/or Section 12 of the Securities Act of 1933. These filings may also have Section 15 claims, but do not have Rule 10b-5 claims.



# Appendices

## Appendix 1: Filings Basic Metrics

Year	Class Action Filings	Disclosure Dollar Loss			Maximum Dollar Loss		
		DDL Total (\$ billions)	DDL Average (\$ millions)	DDL Median (\$ millions)	MDL Total (\$ billions)	MDL Average (\$ millions)	MDL Median (\$ millions)
1997 H1	79	\$11	\$169	\$42	\$52	\$767	\$396
1997 H2	95	\$30	\$354	\$73	\$93	\$1,077	\$411
1998 H1	115	\$36	\$347	\$42	\$88	\$851	\$269
1998 H2	127	\$45	\$381	\$72	\$136	\$1,164	\$337
1999 H1	126	\$63	\$568	\$99	\$146	\$1,325	\$339
1999 H2	83	\$78	\$1,048	\$129	\$218	\$2,949	\$453
2000 H1	111	\$164	\$1,708	\$92	\$331	\$3,452	\$444
2000 H2	105	\$76	\$793	\$143	\$429	\$4,469	\$975
2001 H1	103	\$137	\$1,473	\$98	\$990	\$10,642	\$990
2001 H2	77	\$61	\$872	\$69	\$497	\$7,097	\$657
2002 H1	109	\$81	\$776	\$117	\$926	\$8,899	\$1,402
2002 H2	115	\$120	\$1,212	\$184	\$1,121	\$11,320	\$1,547
2003 H1	105	\$48	\$493	\$92	\$335	\$3,455	\$531
2003 H2	87	\$29	\$394	\$100	\$240	\$3,242	\$368
2004 H1	111	\$57	\$641	\$101	\$307	\$3,455	\$428
2004 H2	117	\$87	\$821	\$117	\$418	\$3,947	\$622
2005 H1	109	\$57	\$618	\$135	\$245	\$2,632	\$463
2005 H2	73	\$35	\$562	\$167	\$117	\$1,862	\$513
2006 H1	65	\$21	\$390	\$118	\$125	\$2,308	\$413
2006 H2	55	\$31	\$611	\$97	\$169	\$3,387	\$439
2007 H1	69	\$37	\$650	\$153	\$171	\$2,992	\$763
2007 H2	108	\$121	\$1,222	\$159	\$530	\$5,351	\$660
2008 H1	111	\$92	\$1,340	\$224	\$471	\$6,822	\$1,361
2008 H2	113	\$129	\$1,674	\$163	\$346	\$4,488	\$1,001
2009 H1	82	\$49	\$1,290	\$167	\$352	\$9,251	\$1,176
2009 H2	82	\$35	\$552	\$134	\$199	\$3,153	\$935
2010 H1	71	\$54	\$1,168	\$162	\$345	\$7,492	\$730
2010 H2	103	\$19	\$318	\$141	\$129	\$2,195	\$392
2011 H1	94	\$49	\$740	\$93	\$256	\$3,882	\$384
2011 H2	95	\$66	\$956	\$91	\$267	\$3,871	\$685
2012 H1	88	\$61	\$841	\$150	\$253	\$3,460	\$659
2012 H2	66	\$36	\$648	\$153	\$152	\$2,720	\$542
2013 H1	75	\$25	\$407	\$163	\$115	\$1,887	\$531
2013 H2	90	\$79	\$1,022	\$148	\$162	\$2,110	\$538
2014 H1	80	\$30	\$431	\$179	\$100	\$1,427	\$541
2014 H2	90	\$26	\$330	\$135	\$120	\$1,544	\$517
2015 H1	102	\$48	\$577	\$90	\$126	\$1,522	\$403
2015 H2	115	\$72	\$754	\$170	\$289	\$3,039	\$644
2016 H1	128	\$43	\$452	\$153	\$381	\$4,012	\$1,031
2016 H2	160	\$63	\$654	\$173	\$467	\$4,816	\$1,059
2017 H1	222	\$72	\$608	\$146	\$292	\$2,455	\$521
2017 H2	190	\$53	\$683	\$189	\$220	\$2,859	\$871
2018 H1	211	\$160	\$1,534	\$233	\$653	\$6,275	\$1,016
2018 H2	209	\$171	\$1,633	\$402	\$664	\$6,323	\$1,134
2019 H1	207	\$175	\$1,507	\$181	\$798	\$6,880	\$828
2019 H2	221	\$108	\$886	\$253	\$394	\$3,229	\$1,237
2020 H1	182	\$81	\$815	\$185	\$584	\$5,895	\$1,014
Average (1997–2019)	112	\$68	\$807	\$141	\$331	\$3,964	\$699

Note:

1. 1933 Act filings in state courts are included in the data beginning in 2010.
2. Average and median numbers are calculated only for filings with MDL and DDL data. Filings without MDL and DDL data include M&A-only filings, initial coin offering filings, and other filings where calculations of MDL and DDL are non-obvious.
3. The number and percentage of U.S. exchange-listed firms sued are based on core filings.

**Appendix 2A: S&P 500 Securities Litigation—Percentage of S&P 500 Companies Subject to Core Federal Filings**

Year	Consumer Discretionary	Consumer Staples	Energy / Materials	Financials / Real Estate	Health Care	Industrials	Comm / Telecom / IT	Utilities	All S&P 500 Companies
2001	2.4%	8.3%	0.0%	1.4%	7.1%	0.0%	18.0%	7.9%	5.6%
2002	10.2%	2.9%	3.1%	16.7%	15.2%	6.0%	11.0%	40.5%	12.0%
2003	4.6%	2.9%	1.7%	8.6%	10.4%	3.0%	5.6%	2.8%	5.2%
2004	3.4%	2.7%	1.8%	19.3%	10.6%	8.5%	3.2%	5.7%	7.2%
2005	10.3%	8.6%	1.7%	7.3%	10.7%	1.8%	6.7%	3.0%	6.6%
2006	4.4%	2.8%	0.0%	2.4%	6.9%	0.0%	8.1%	0.0%	3.6%
2007	5.7%	0.0%	0.0%	10.3%	12.7%	5.8%	2.3%	3.1%	5.4%
2008	4.5%	2.6%	0.0%	31.2%	13.7%	3.6%	2.5%	3.2%	9.2%
2009	3.8%	4.9%	1.5%	10.7%	3.7%	6.9%	1.2%	0.0%	4.4%
2010	5.1%	0.0%	4.3%	10.3%	13.5%	0.0%	2.4%	0.0%	4.8%
2011	3.8%	2.4%	0.0%	1.2%	2.0%	1.7%	7.1%	0.0%	2.6%
2012	4.9%	2.4%	2.7%	3.7%	1.9%	1.6%	3.8%	0.0%	3.0%
2013	8.4%	0.0%	0.0%	0.0%	5.7%	0.0%	9.1%	0.0%	3.4%
2014	1.2%	0.0%	1.3%	1.2%	0.0%	4.7%	0.0%	0.0%	1.2%
2015	0.0%	5.0%	0.0%	1.2%	1.9%	0.0%	4.2%	3.4%	1.6%
2016	3.6%	2.6%	4.5%	6.9%	17.9%	6.1%	6.8%	3.4%	6.6%
2017	8.5%	2.7%	3.3%	3.3%	8.3%	8.7%	8.5%	7.1%	6.4%
2018	10.0%	11.8%	1.8%	7.0%	16.1%	8.8%	12.7%	7.1%	9.4%
2019	3.1%	12.1%	3.7%	2.0%	12.9%	10.1%	10.0%	6.9%	7.2%
2020 (Annualized)	9.5%	6.1%	0.0%	6.2%	10.0%	2.9%	2.2%	0.0%	4.8%
Average 2001–2019	5.2%	3.8%	1.6%	7.7%	9.1%	4.2%	6.5%	5.2%	5.5%

**Appendix 2B: S&P 500 Securities Litigation—Percentage of Market Capitalization of S&P 500 Companies Subject to Core Federal Filings**

Year	Consumer Discretionary	Consumer Staples	Energy / Materials	Financials / Real Estate	Health Care	Industrials	Comm / Telecom / IT	Utilities	All S&P 500 Companies
2001	1.3%	6.3%	0.0%	0.8%	5.4%	0.0%	32.6%	17.4%	10.9%
2002	24.7%	0.3%	1.2%	29.2%	35.2%	13.3%	9.1%	51.0%	18.8%
2003	2.0%	2.3%	0.4%	19.9%	16.3%	4.6%	1.7%	4.3%	8.0%
2004	7.9%	0.1%	29.7%	46.1%	24.1%	8.8%	1.2%	4.8%	17.7%
2005	5.7%	11.4%	1.6%	22.2%	10.1%	5.6%	10.3%	5.6%	10.7%
2006	8.9%	0.8%	0.0%	8.2%	18.1%	0.0%	8.3%	0.0%	6.7%
2007	4.4%	0.0%	0.0%	18.1%	22.5%	2.2%	3.4%	5.5%	8.2%
2008	7.2%	2.6%	0.0%	55.0%	20.0%	26.4%	1.4%	4.0%	16.2%
2009	1.9%	3.9%	0.8%	31.2%	1.7%	23.2%	0.3%	0.0%	7.7%
2010	4.9%	0.0%	5.2%	31.1%	32.7%	0.0%	5.9%	0.0%	11.1%
2011	4.6%	0.8%	0.0%	6.9%	0.7%	2.1%	13.4%	0.0%	5.0%
2012	1.6%	14.0%	0.9%	11.0%	0.8%	1.2%	2.2%	0.0%	4.3%
2013	4.4%	0.0%	0.0%	0.0%	4.4%	0.0%	16.6%	0.0%	4.7%
2014	2.5%	0.0%	0.2%	0.3%	0.0%	1.7%	0.0%	0.0%	0.6%
2015	0.0%	1.9%	0.0%	3.0%	3.1%	0.0%	7.0%	3.7%	2.8%
2016	2.8%	1.0%	19.8%	11.9%	13.2%	8.7%	12.3%	4.4%	10.0%
2017	8.2%	6.7%	2.3%	1.5%	2.7%	22.3%	4.4%	9.6%	6.1%
2018	4.7%	15.2%	1.4%	12.5%	26.3%	19.4%	19.4%	6.5%	14.9%
2019	0.5%	9.1%	1.2%	2.2%	6.6%	21.6%	18.0%	7.9%	10.0%
2020 (Annualized)	3.4%	3.5%	0.0%	13.6%	5.5%	2.3%	0.6%	0.0%	4.0%
Average 2001–2019	4.8%	4.4%	2.8%	14.3%	12.3%	9.3%	10.4%	6.1%	9.0%

Note: Average figures are calculated as the sum of the market capitalization subject to core filings in a given sector from 2001 to 2018, divided by the sum of market capitalization in that sector from 2001 to 2018.

### Appendix 3: 1933 Act Filings in State Courts

Year	1933 Act Filings in State Courts						
	California	New York	Texas	Massachusetts	Pennsylvania	Others	All
2010	1	0	0	0	0	0	1
2011	3	0	0	0	0	0	3
2012	5	0	0	0	0	2	7
2013	1	0	0	0	0	0	1
2014	5	0	0	0	1	0	6
2015	15	0	0	2	0	0	17
2016	19	0	1	1	0	6	27
2017	7	0	1	0	1	4	13
2018	16	13	0	0	0	6	35
2019	15	19	2	1	3	12	52
2020 H1	1	9	0	1	0	1	12
Average (2010–2019)	9	3	0	0	1	3	16

Note:

1. Filings in 2010 through 2017 include Section 11 claims and may also include Section 12 and Section 15 claims, but do not include allegations of Rule 10b-5 violations. Beginning in 2018, the Securities Class Action Clearinghouse began tracking 1933 Act filings in California state courts with Section 11 or Section 12 claims.
2. “Others” includes filings in Alabama, Arizona, Colorado, Florida, Georgia, Illinois, Iowa, Michigan, Nevada, New Hampshire, New Jersey, Oregon, Rhode Island, Tennessee, Washington, West Virginia, and Wisconsin.

### Appendix 4: Filings by Industry—Core Federal Filings

(Dollars in billions)

Industry	Class Action Filings				Disclosure Dollar Loss				Maximum Dollar Loss			
	Semiannual Average 1997–2019	2019 H1	2019 H2	2020 H1	Semiannual Average 1997–2019	2019 H1	2019 H2	2020 H1	Semiannual Average 1997–2019	2019 H1	2019 H2	2020 H1
Consumer Non-Cyclical	26	45	42	32	\$20	\$43	\$25	\$33	\$78	\$181	\$143	\$169
Communications	14	19	18	8	\$12	\$18	\$37	\$3	\$74	\$95	\$68	\$34
Technology	11	12	17	14	\$11	\$87	\$13	\$7	\$48	\$389	\$37	\$37
Financial	15	10	12	15	\$9	\$2	\$8	\$20	\$54	\$17	\$24	\$244
Industrial	9	14	6	5	\$7	\$16	\$6	\$1	\$25	\$60	\$44	\$9
Consumer Cyclical	10	8	12	16	\$5	\$3	\$7	\$6	\$26	\$7	\$36	\$55
Energy	4	4	6	5	\$2	\$2	\$3	\$4	\$11	\$8	\$16	\$26
Basic Materials	2	5	3	3	\$1	\$6	\$4	\$3	\$8	\$9	\$14	\$4
Utilities	1	0	5	0	\$1	\$0	\$2	\$0	\$5	\$0	\$20	\$0
Unknown/Unclassified	1	5	0	13	\$0	\$0	\$0	\$1	\$0	\$0	\$0	\$1
Total	93	122	121	111	\$68	\$176	\$104	\$80	\$329	\$766	\$404	\$579

Note:

1. Figures may not sum due to rounding.
2. Analysis excludes filings with missing sector information or infrequently used sectors.

### Appendix 5: Filings by Circuit—Core Federal Filings

(Dollars in billions)

Circuit	Class Action Filings				Disclosure Dollar Loss				Maximum Dollar Loss			
	Semiannual Average 1997–2019	2019 H1	2019 H2	2020 H1	Semiannual Average 1997–2019	2019 H1	2019 H2	2020 H1	Semiannual Average 1997–2018	2019 H1	2019 H2	2020 H1
1st	4	3	3	1	\$4	\$1	-\$2	\$0	\$11	\$3	\$27	\$0
2nd	26	51	52	40	\$22	\$54	\$28	\$17	\$117	\$241	\$118	\$227
3rd	9	14	13	11	\$9	\$7	\$11	\$20	\$34	\$20	\$79	\$41
4th	3	2	5	1	\$1	\$0	\$1	\$0	\$6	\$0	\$14	\$3
5th	6	5	8	6	\$3	\$0	\$4	\$4	\$17	\$2	\$18	\$36
6th	4	5	6	3	\$3	\$1	\$7	\$1	\$13	\$3	\$21	\$4
7th	4	5	3	5	\$4	\$21	\$8	\$10	\$16	\$92	\$14	\$103
8th	3	0	2	0	\$1	\$0	\$2	\$0	\$6	\$0	\$5	\$0
9th	24	28	24	35	\$17	\$91	\$43	\$22	\$91	\$396	\$105	\$118
10th	3	2	4	4	\$1	\$1	\$2	\$1	\$6	\$4	\$3	\$5
11th	7	7	1	5	\$2	\$1	\$0	\$5	\$10	\$4	\$0	\$40
D.C.	0.4	0	0	0	\$0.3	\$0	\$0	\$0	\$1.5	\$0	\$0	\$0
Total	93	122	121	111	\$6	\$176	\$104	\$80	\$27	\$766	\$404	\$579

Note: Figures may not sum due to rounding.

# Research Sample

- The Stanford Law School Securities Class Action Clearinghouse, in collaboration with Cornerstone Research, has identified 5,764 federal securities class action filings between January 1, 1996, and June 30, 2020 (securities.stanford.edu). The analysis in this report is based on data identified by Stanford as of July 10, 2020.
- The sample used in this report includes federal filings that typically allege violations of the Securities Act of 1933 Section 11, the Securities Exchange Act of 1934 Section 10b, Section 12(a) (registration requirements), or Section 14(a) (proxy solicitation requirements).
- The sample is referred to as the “classic filings” sample and excludes IPO allocation, analyst, and mutual fund filings (313, 68, and 25 filings, respectively).
- Multiple filings related to the same allegations against the same defendant(s) are consolidated in the database through a unique record indexed to the first identified complaint.
- In addition to federal filings, class actions filed in state courts since January 1, 2010, alleging violations of the Securities Act of 1933 are separately tracked.
- An additional 180 class action filings in state courts from January 1, 2010, to June 30, 2020, have also been identified.

The views expressed in this report are solely those of the authors, who are responsible for the content, and do not necessarily represent the views of Cornerstone Research.

The authors request that you reference Cornerstone Research and the Stanford Law School Securities Class Action Clearinghouse in any reprint of the information or figures included in this study.

Please direct any questions to:

**Alexander Aganin**

650.853.1660

aaganin@cornerstone.com

## Cornerstone Research

Cornerstone Research provides economic and financial consulting and expert testimony in all phases of complex litigation and regulatory proceedings. The firm works with an extensive network of prominent faculty and industry practitioners to identify the best-qualified expert for each assignment. Cornerstone Research has earned a reputation for consistent high quality and effectiveness by delivering rigorous, state-of-the-art analysis for more than thirty years. The firm has over 700 staff and offices in Boston, Chicago, London, Los Angeles, New York, San Francisco, Silicon Valley, and Washington.

[www.cornerstone.com](http://www.cornerstone.com)

