

KEITH R. UGONE, PH.D.

Senior Advisor (Managing Principal - Retired)

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Dr. Keith R. Ugone has provided economic and damages consulting services in antitrust cases, breach of contract cases, business interruption cases, class action certification matters, employment / loss of earnings cases, intellectual property cases, lender liability cases, professional negligence cases, and securities-related cases, among others. He specializes in the application of economic principles to complex business disputes and generally is retained in cases requiring economic analyses and/or damages-related analyses. Damage models constructed or evaluated by Dr. Ugone have had as components revenue analyses, lost sales analyses, cost analyses, assessments of the capacity to produce additional units, assessments of profitability, the competitive business environment in which the damages claim was being made, claimed lost profits, claimed lost business value, and claimed reasonable royalties. During the course of Dr. Ugone's career, he has frequently evaluated lost profits and valuation-related damages using large databases of information and complex computer models. Dr. Ugone also has performed economic liability analyses in antitrust matters including defining relevant markets, assessing market power, and evaluating alleged anticompetitive behavior. Dr. Ugone has testified at trial and in deposition over 500 times since 1990.

Dr. Ugone has a PhD in Economics from Arizona State University, an MA in Economics from the University of Southern California, and a BA in Economics from the University of Notre Dame. Subject areas of expertise include microeconomics, macroeconomics, industrial organization, antitrust/regulation, and econometrics. He is a member of the American Economic Association, the American Statistical Association, the National Association of Forensic Economics, and the Western Economics Association.

EDUCATION

1983 Ph.D., Economics, Arizona State University.
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1979 M.A., Economics, University of Southern California.

1977 B.A., Economics, University of Notre Dame.

PROFESSIONAL EXPERIENCE

2004 - Present	Analysis Group, Dallas, Texas – Senior Advisor (June 2020 - present); Managing Principal
	(2004 - May 2020; retired).

- 1985 2003 PricewaterhouseCoopers LLP (and legacy firms) Partner (Principal) 1992 2003; Senior Manager 1989 1992; Manager 1987 1989; Senior Consultant 1985 1987. Member of United States Admissions Committee (2003). Chairman of PricewaterhouseCoopers Intellectual Property Leadership Forum (2000 2003).
- 1983 1985 California State University, Northridge Assistant Professor/Lecturer in Department of Economics, Full-time: 1983 1985, Part-time: 1986 1992.
- 1979 1983 Arizona State University Faculty Associate/Teaching Assistant in Department of Economics.
- 1977 1979 Jet Propulsion Laboratory Economic/Energy Analyst.

PROFESSIONAL AND BUSINESS AFFILIATIONS

American Economic Association American Statistical Association National Association of Forensic Economics Western Economics Association

SELECTED LITIGATION CONSULTING EXPERIENCE (by Nature of Suit)

Securities: 10b-5 / Section 11 Cases

- Evaluated the economic damages being asserted by shareholders and debt holders of a bankrupt energy trading company against a brokerage firm. Plaintiffs alleged the brokerage firm recommended the stock and debt securities associated with the company even though it knew or should have known the deteriorating pre-bankruptcy financial condition of the company. Analyzed the trading patterns of the brokerage account customers and the stock price movements of the company upon issuance of analyst reports, and researched confounding events contributing to investors' trading of the securities-in-question. Demonstrated an economic causal link did not exist between the alleged wrongful conduct and the claimed trading patterns. Also evaluated the event study conducted by Plaintiffs' damages expert and the claimed inflation component embedded in the company's stock price. Demonstrated Plaintiffs' damages expert failed to remove the economic impact of confounding events. Performed an alternative damages evaluation.
- Evaluated shareholder and debt holder claimed damages against a major accounting firm relating to the issuance of allegedly false and misleading financial statements that did not identify certain assets of a communications company as impaired. Researched industry reports and analyst reports regarding the company's common stock and debt securities, evaluated an event study conducted by Plaintiff's damages expert, analyzed loss causation in accordance with *Dura*, studied the company's stock price movements before and during the claimed class period, and analyzed the company's stock price movement on the day of the alleged corrective disclosure. Demonstrated Plaintiffs' event study did not appropriately isolate the stock price movement associated solely with the alleged corrective disclosure as confounding events were not removed from the analysis. Performed an alternative damages calculation.
- Evaluated Plaintiffs' damages claim in a shareholder suit relating to the manufacturer of decoding equipment used in the wireless cable industry. Analysis demonstrated Plaintiffs' financial expert did not consider market speculation related to the wireless cable industry or Defendant's higher-than-expected earnings when calculating claimed damages. Additional errors included aggregating into claimed damages stock price increases unrelated to Plaintiffs' allegations and on "no announcement days".
- Evaluated damages claim against a major investment banking/underwriting firm relating to an aborted initial public offering in the temporary staffing industry. Analysis demonstrated methodological and conceptual errors in Plaintiff's econometrically-based claim that the projected post-IPO stock price of the company justified proceeding with the IPO. Also evaluated various components of Plaintiff's damages claim, including the profitability of Plaintiff's business, projected use of funds raised, ownership percentages in the company, and the funds that would have inured to the original owners of the company.
- Evaluated Plaintiffs' damages claim in a shareholder suit involving an international airline carrier. At issue were alleged misrepresentations concerning the airline's ability to reduce its maintenance costs. Demonstrated that the fifty percent decline in the company's stock price over a one-month period was for reasons unrelated to corrective disclosures concerning maintenance costs. Also reconstructed Plaintiffs' trading history, comparing the trading pattern to public announcements concerning the airline, and demonstrating a trading pattern inconsistent with Plaintiffs' theory of reliance on the alleged misrepresentations.

• General Overview. Performed an "event study" and/or evaluated claimed damages in various securities litigation cases involving firms in industries such as: airlines, biotechnology, computer software, commodities, banking, real estate development, life insurance, entertainment, communications, energy trading, investment banking, computer printers, health care, medical equipment, hotels, non-traditional automotive insurance, information technology services, workmen's compensation insurance, computer hardware, camera and photo finishing, intelligent disk drives, market research, trucking, temporary staffing, real estate investment trusts, computer networking, specialty stores, skilled nursing facilities, wireless cable encoding devices, the provision of software computer services to insurance companies, and the provision of professional services to power plants and large scale industrial facilities. Analyses included development of an appropriate peer group and isolation of economy-wide, industry-specific, and company-specific factors impacting the particular firm's stock price. Company-specific events often included unfavorable news announcements unrelated to the alleged misrepresentations and the ending of potential takeover bids. Also involved was a comparison of the firm's actual stock price to its "true value" line, the construction of a matrix to track ins-and-outs traders and retention shareholders, and an evaluation of damages under Section 10b-5 and Section 11 claims.

Securities: Merger/Takeover Related Cases

- Evaluated claimed damages against a major accounting firm by a transportation company that acquired another transportation company in alleged reliance upon the audited financial statements of the acquired company and its Mexican subsidiary. Plaintiff wrote down its investment in the Mexican subsidiary after the acquisition and based its damages claim on a subsequent decline in its stock price. Analyses included researching competing transportation companies, considerations associated with consummating the merger, analyst reports regarding the merger announcement and the investment write-down announcement, and earnings announcements from comparable companies. Demonstrated Plaintiff's damages expert did not establish an economic causal link between the alleged wrongful conduct of the Defendant and the claimed economic damages suffered by the Plaintiff and that confounding events were not taken into account appropriately.
- Evaluated Plaintiffs' damages claim relating to a merger in the banking industry. At issue was whether
 material adverse changes regarding loan loss reserves had occurred but were not disclosed. Analyzed
 whether the complained of events were related to conditions and circumstances in the banking industry.
 Also analyzed the value of alternative offers for the target bank and the pre-merger volatility in the
 acquiring bank's stock price.
- Evaluated Plaintiffs' claimed damages in a breach of contract matter involving the aborted sale of assisted living facilities. Analyzed current trends in the assisted living industry, the financial condition of the target company, the projected financial results of certain to-be-constructed properties, and the target company's performance relative to projections. Also at issue was whether a material adverse change had occurred in the target company's operations and business. Lost profit damages, interest-related damages, lost contract fees, and diminution-in-value damages were evaluated.
- Evaluated Plaintiffs' damages claim in a merger/acquisition-for-stock litigation in the information technology services industry. At issue was whether material adverse changes had occurred in the business condition of the acquiring company prior to the closing of the merger. Damages issues included investigating the nature of the agreed upon warranties and representations contained in the merger agreement, the stock price performance of similarly-situated firms, the length of the alleged damages period, the appropriate length of certain event windows, industry downturns, and the failure to account for the proper mitigation of damages.
- Analyzed a major entertainment company's stock price movement to determine the takeover premium
 paid by an acquiring company. Involved was quantifying the impact of takeover rumors prior to the
 takeover announcement to isolate that portion of the company's pre-acquisition increase in stock price
 due to takeover speculation as opposed to general industry trends.

• Served as financial advisor to a Special Litigation Committee ("SLC") investigating a shareholder approved merger vote in the telecommunications industry. The merger was not consummated, but the vote triggered the acceleration of vesting of options owned by the officers and directors of the target company. Assisted the SLC in analyzing the acceleration of options and various alternative settlement strategies.

Securities/Commodities: Other Cases

- Evaluated Plaintiff's claimed lost enterprise value damages relating to Defendants' allegedly fraudulent conduct resulting in an artificial acceleration of income, restatement of income, and ultimate bankruptcy of a food distribution company. Analyses included isolating the dollar magnitude of the alleged artificial acceleration of income allegedly created by Defendant's actions compared to other artificial accelerations of income, an assessment of alternative reasons for Plaintiff's business decline and ultimate bankruptcy, and evaluation of Plaintiff's valuation approaches.
- Evaluated the spot price of a base metal in a major commodities-related market manipulation matter. Developed an econometric model to explain the spot price movements of the base metal in an unimpacted period. Used the econometric model to evaluate what the spot price of the base metal would have been in the absence of the alleged manipulation.
- Calculated short-swing trading profits under Section 16(b) of the Securities Exchange Act of 1934 relating to the stock trading activities of an officer of a long distance telecommunications company. Issues analyzed included allocating stock purchases to stock sales of differing numbers of shares and accounting for a 3-for-1 reverse stock split during the period under consideration.
- Evaluated damages in an alleged lack of suitability, lack of supervision, and failure to execute matter in the securities industry. At issue was an investment strategy of selling short the same stock in which a restricted long position was also held. Demonstrated errors in Plaintiff's damages claim, including the failure to recognize that the financial objectives stated at the time of the development of the investment strategy were in fact met.
- Evaluated the stock price performance of a major distiller over a forty-year period. At issue was whether a portion of the increase in the stock price could be attributed to the efforts of one senior official in the corporation. Company-specific, industry-specific, and economy-wide factors were investigated to determine the reasons for the stock price performance of the distilling company.

Antitrust: Monopolization/Attempted Monopolization Cases

- Evaluated claimed antitrust damages asserted by a major airline company against a global distribution system ("GDS") operator for alleged anticompetitive behavior relating to the provision of booking services to travel agencies. Evaluated Plaintiff's claimed damages relating to claimed lost profits resulting from the Defendant's alleged actions to impede the rollout of a competing technology for booking services, contractual restrictions allegedly preventing the airline from offering targeted discounts to price-sensitive customers, allegedly imposing retaliatory booking fee increases, and allegedly biasing fare search results displayed to travel agencies.
- Analyzed Plaintiff's allegations that Defendant monopolized or attempted to monopolize the market for magnetic brakes for amusement park rides. Evaluated Plaintiff's assessment of the relevant product market, allegations of market power, and the impact of Defendant's alleged anti-competitive conduct. Also evaluated claimed damages, including assumptions underlying Plaintiff's claimed damages model and economic causal connection between the alleged wrongful conduct and claimed losses. Determined that Plaintiff's expert failed to account for alternative explanations for Plaintiff's claimed losses. Also demonstrated that Plaintiff's expert made inappropriate assumptions regarding growth in the claimed relevant product market and whether Plaintiff was damaged in perpetuity.

- Evaluated Plaintiff's economic liability arguments in an antitrust matter relating to a restriction on the registration of cloned American Quarter Horses with the American Quarter Horse Association. Evaluated Plaintiff's expert's theoretical economic model. Demonstrated that there was no economic harm to the market as a result of the at-issue registration restriction. Also identified numerous flaws in Plaintiff's expert's assumptions regarding the supply and demand of high quality American Quarter horses (including excess breeding capacity). Evaluated Plaintiff's damages claim relating to lost sales of cloned American Quarter horses and lost breeding opportunities.
- Evaluated the claimed anticompetitive impact of an alleged conspiracy by a major oil and gas exploration company to monopolize the market for Helicopter Underwater Egress Training ("HUET"). Evaluated the relevant product and geographic markets and the alleged market power of the Defendant. Demonstrated that the Defendant lacked the market power necessary to monopolize the relevant market. Also demonstrated the flaws in Plaintiffs' damages claim, including but not limited to, loss of Plaintiffs' market share for reasons other than the alleged anticompetitive acts (e.g., self-imposed price increases and the loss of a large customer unrelated to the alleged wrongful conduct), failure to take into account the general economic downturn in the U.S. economy during the relevant period, the use of an inappropriate discount rate for quantifying claimed future damages, and the use of an inappropriate assumption relating to future claimed market shares in the absence of the alleged wrongful conduct.
- Evaluated the competitive impact of certain covenants not to compete associated with restricted stock unit awards issued to operations management employees by a major dairy processor. Evaluated the relevant product and geographic markets. Concluded that the covenants not to compete were overly broad and restrictive, outweighing any precompetitive benefits associated with the covenants. Concluded that the covenants did not contain reasonable limitations as to time frame and scope of activity. The covenants effectively restricted competition and raised rivals' costs in the relevant market.
- Evaluated Plaintiff's damages claim associated with the assertion that certain freight forwarders engaged in bid rigging, price fixing, group boycott, and illegal tying arrangements in a traffic channel for transporting military household goods. Demonstrated the flaws in Plaintiff's damages claim, including but not limited to, declines in revenues and profits prior to the alleged conspiracy period, alternative reasons for the Plaintiff's poor performance during the claimed damages period (e.g., the closing of military bases and increased competition in one leg of the channel), and the use of an inappropriate benchmark period for quantifying claimed damages.
- Evaluated the anticompetitive impact of an alleged conspiracy between a distributor and manufacturer whereby the manufacturer refused to ship certain aftermarket automotive exhaust systems and catalytic converters to a competing distributor in Washington and Oregon. Analyses included evaluating the relevant product and geographic markets for aftermarket automotive exhaust products and the damages suffered by the competing distributor. Also evaluated the competing distributor's direct and indirect price discrimination claims (including differential discounts in areas where shipments did occur) and associated claimed damages.
- Analyzed various monopolization allegations in an antitrust counterclaim to a patent infringement matter
 in the home lighting control systems industry. Analyzed the trade practices of the home lighting control
 system manufacturers (e.g., sales channels, advertising and promotion, etc.), product and geographical
 markets, and the potential substitutes to the products at issue. Analyses demonstrated counterclaim
 Defendant did not possess the ability to monopolize the relevant market for home lighting control
 products given the channels through which manufacturers made sales and the availability of close
 substitute products.

- Evaluated Plaintiff's economic liability arguments in an antitrust counterclaim relating to a supply agreement for an ingredient (i.e., larch arabinogalactan) contained in certain patented dietary and nutritional supplements for the promotion and maintenance of good health. Concluded that (a) the sales agreement in question did not constitute an unreasonable restraint on trade, (b) the Defendant did not possess monopoly power, and (c) the Defendant did not engaged in anticompetitive behavior in any properly defined relevant market. Observed that the prices of dietary supplements containing arabinogalactan did not increase since the signing of the sales agreement, the output of dietary supplements containing arabinogalactan did not decline since the signing of the sales agreement, (c) the capacity to produce additional arabinogalactan had been increasing, and (d) Plaintiff did not face a dangerous probability of being harmed by the supply agreement.
- Evaluated claimed antitrust damages asserted by the holder of certain common packet channel ("CPCH") technology patents against a group of handheld mobile device hardware and infrastructure manufacturers for an alleged conspiracy to deprive the patent holder of the value of its patented technology in the third generation partnership project ("3GPP"). The patent holder's technology had been removed as an optional standard. Damages-related analyses included conducting a *Georgia-Pacific* analysis and analyzing the licenses identified by Plaintiff's expert as comparable to the patents at issue. Also determined that Plaintiff's expert had not established an economic causal link between the alleged wrongful conduct and the damages being claimed.
- Evaluated the claimed anticompetitive activities of Defendant hospital's alleged exclusionary arrangements and practices relating to managed care contracts. Evaluated the relevant antitrust markets (product and geographic) for primary care services provided by physicians to managed care-covered patients in Smith County, Texas. Also evaluated the volume of commerce impacted by the claimed exclusionary practices and the impact of these claimed exclusionary practices on competition in the relevant markets. In addition, evaluated the economic damages suffered by the Plaintiff hospital as a result of Defendant's alleged anticompetitive activities.
- Evaluated Plaintiff's claim of antitrust injury in the markets for orthodontic brackets and orthodontic services allegedly due to the advertising guidelines promulgated by a national orthodontic trade association. Analysis demonstrated the advertising guidelines were efficiency enhancing (by lowering consumer search costs), promoted competition, and did not stifle innovation in the relevant markets. Also empirically demonstrated that legitimate advertising through a variety of media was not impacted by the advertising guidelines.
- Evaluated distributors' claims of past lost profits, future lost profits, and reductions in franchise values in a carbonated soft drink antitrust litigation. Defendants allegedly entered into a series of anti-competitive marketing agreements with retailers relative to the promotion and sale of national brand carbonated beverages. Analysis demonstrated Plaintiffs' expert did not take into account the brand composition of Plaintiffs' case sales, underestimated variable costs of distribution, did not adjust for increased competition from private-label brands and other drinks, and failed to account for the lack of advertising and other promotional support from the distributors' parent company.
- Analyzed the impact of a proposed merger of two insurance companies on the long term care and
 medicare supplement insurance markets in the state of Oklahoma. Evaluated whether the merger would
 substantially lessen competition or have a tendency to create a monopoly. Evaluated the number of
 competitors, the reasonable interchangeability of the insurance products offered, insurance company
 sizes, ease of entry, the impact of regulation, and the ability of consumers to acquire price information in
 a low-cost manner.
- Analyzed the alleged anticompetitive impact of an exclusive provider arrangement between a hospital
 and a group of anesthesiologists on the market for anesthesia services. Analyses included determining
 inpatient services market shares, anesthesia procedures market shares, and recent entry into the hospital
 service area. Also evaluated the damages claims being alleged by a group of Certified Registered Nurse
 Anesthetists.

- Conducted an economic analysis in a vertical non-price (advertising) restraint antitrust case dealing with tennis ball throwing machines. Analysis demonstrated the pro-competitive nature of the advertising restraint and that the termination of a non-complying dealer did not substantially reduce competition in the relevant market.
- General Overview. Provided economic analyses and developed damages models and/or critiqued the opposition's damages models in various antitrust cases involving the following industries and/or markets: anesthesia services, printed circuit boards, nutritional supplements, carbonated soft drinks, aftermarket automotive exhaust systems, telecommunications switching equipment, dairy processing, radio control model airplanes, local area networks, entertainment lighting, integrated casino bonusing software, home lighting control systems, medicare supplement/long term care insurance, commercial air conditioning units, disposable dust/mist respirators, immunodiagnostic tests, in-patient hospital services and managed care contracts, PBX systems, military freight forwarding, underground storage tanks, long distance telephone lines, tennis ball throwing machines, check processing readers/sorters, local television advertising, personal watercraft, automobile refinishing paint, Christian music, subsea horizontal extraction wells, orthodontic braces, DRAM microcomputer chips, women's designer clothes, single point of contact telecommunication services, non-prescription reading glasses, and the provision of temporary electrical services to convention centers. Damages models were constructed or critiqued that involved lost sales analyses, incremental cost analyses, and assessments of capacity increases. Also investigated were economic forces external to the company that may have impacted the company's performance. Economic analyses included defining the relevant market, assessing the presence or absence of market power, evaluating whether a business activity was pro-competitive or anti-competitive, and/or evaluating the level of competition in a particular market.

Antitrust: Price Fixing Cases

- Evaluated Plaintiffs' claimed damages relating to allegations of an industry-wide price fixing conspiracy among the defendant manufacturers of polyether polyol products. At issue were the alleged overcharges relating to sales of TDI, MDI, and polyether polyols during the alleged conspiracy period. Analyses included evaluating Direct Action Plaintiffs' and Class Plaintiffs' econometric pricing models which purported to show alleged overcharges (and the unreasonableness of the claimed overcharges in light of existing profitability levels). Also assessed indicators of competition in the relevant market, including evidence of supplier switching by Plaintiffs, changes in defendants' market shares, and pricing patterns of the at-issue products.
- Evaluated allegations of price-fixing among freight companies relating to bids to ship the household goods of U.S. Armed Forces' members and civilian employees of the U.S. Department of Defense between Germany and the U.S. Analyses included an investigation of the efficiency-enhancing economic benefits provided by the at-issue "landed rate" pricing system. Also evaluated Plaintiff's claimed damages allegedly associated with elevated rates and alternative factors contributing to claimed elevated rates unrelated to claimed conspiracy. Evaluated Plaintiff's econometric model used to purportedly identify claimed overcharges.

Antitrust: Predatory Pricing/Price Discrimination Cases

- Evaluated differences in prices paid by a plaintiff distributor relative to those paid by a competitor in a price discrimination case involving the distribution of aftermarket exhaust systems. Analyses included an evaluation of the relevant product and geographic market for the at-issue products as well as damages caused by the alleged anticompetitive behavior.
- Evaluated the relevant product and geographic markets and impact on competition in a price discrimination case involving a manufacturer of lighting products and the prices charged to various distributors. Analyses included an investigation of the primary-line market (i.e., competition among manufacturers of lighting products) and the secondary-line market (i.e., competition among distributors). The impact on competition among the distributors of lighting products was investigated (and whether a substantial lessening of competition occurred) given the pricing policies of the manufacturer.

- Reviewed the newly proposed pricing structure of a major magazine distributor to identify the efficiency
 enhancing attributes of the proposed pricing structure as well as potential discriminatory effects. The
 proposed pricing structure was a major change from industry practices and included per copy distribution
 fees and excess return fees.
- Evaluated the economic and damages-related claims made in a major price discrimination case in the pharmaceutical industry. At issue were the additional sales and profits that would have been made by grocery drug stores and retail drug chains in the absence of the alleged price discrimination.
- Conducted various industry and firm-specific analyses in a major wholesale bread predatory pricing case. Bread industry studies included analyses of industry profitability rates, the changing size distribution of firms in the industry, and general trends in wholesale bread prices. Firm-specific studies included analyses of advertising rates, "cripple" (i.e., reject) rates, and "stale" (i.e., return) rates. Also involved was a critique of Plaintiff's calculation of Defendant's average variable cost of producing and distributing a loaf of bread.
- Calculated the average cost of servicing a three-yard bin of trash in a solid waste disposal predatory pricing case. Also included was an analysis of number of routes and bin pickups per route.

Antitrust: Tying Cases

- Evaluated certain economic and damages claims made by a local television station against a television program syndicator. At issue was an alleged unlawful tying arrangement relating to the claimed requirement to license *Becker* in order to license *Judge Judy* and *Judge Joe Brown*. Demonstrated the syndicator did not possess market power in a properly defined market since substitution existed between different genre of television programs, between different syndicators, between different demographic groups, and between different types of syndicated programming (i.e., first-run, off-network, and evergreen programming). Also demonstrated that the pricing patterns of the syndicator were inconsistent with the antitrust claims being made.
- Evaluated an unlawful tying claim brought by a pizza franchisee against its franchisor. Franchisees were required to purchase equipment and supplies from an approved supplier owned by the pizza franchisor. Plaintiff alleged the claimed unlawful tying arrangement was enforced through threats of termination of the franchise agreement. Demonstrated that the pizza franchisor did not possess market power in the consumer market for pizza, in the provision of equipment and supplies to franchisees, or in the market for pizza franchises. Also demonstrated the economic justifications for the requirement (i.e., maintaining quality standards, uniformity of operations, and protection of brand name).
- Critiqued Plaintiff's damage model in an alleged tying case dealing with automotive CAD/CAM design software (the "tying" good) and mainframe timesharing (the "tied" good). At issue was the total size of the market, the likelihood of entry, and the market share of the Plaintiff in the absence of the alleged tie. Also investigated was the likelihood that design vendors would place the software on their own mainframes rather than timeshare.
- Analyzed the fast food point-of-sale ("POS") equipment and software industry in an alleged tying case.
 Demonstrated that a particular POS product was not a relevant market based on the reasonable interchangeability of various brands of fast food POS equipment from the perspective of the consumer (fast food restaurants). Also analyzed the degree of price competition, non-price competition, ease of entry, and relative market shares of fast food POS equipment manufacturers.

Business Interruption/Interference Cases

• Evaluated Plaintiffs' claimed damages in a tortious interference, business disparagement, and breach of contract matter dealing with the licensing of testing equipment in the petrochemical piping inspection industry. Demonstrated Plaintiff's expert committed errors relating to the duration of the contracts in dispute, system license fees, cost of replacement systems, pricing of services, utilization of the test systems, and mitigation of future damages.

- Evaluated Plaintiff's claimed damages from a lost bid to retrofit a refinery in Pakistan. Analyzed Plaintiff's allegations that Defendants made untrue statements to the bid evaluation team concerning Plaintiff's net worth, working capital, and profitability trends. Evaluated Plaintiff's claimed damages using as a benchmark prior engineering projects completed by Plaintiff.
- Calculated damages suffered by the owner of numerous mobile home parks due to the actions of a Defendant in a case involving alleged intentional interference with contractual relations. Involved was an analysis of occupancy rates, a projection of park revenues in the absence of the alleged interference, and an analysis of mobile home park incremental profitability rates.
- Evaluated the damages sustained by a cosmetic company as a result of defective decorated glass containers being furnished for its new therapy products. Evaluated and/or verified product retrieval costs, retrieval program administration costs, customer goodwill replacement gift costs, waste disposal costs, and lost profits on the therapy products. The lost profits analysis included assessing the life cycle sales pattern of new cosmetic products introduced by the company.
- Evaluated damages relating to the introduction of a new popcorn product line in a business interruption dispute. The introduction of the new popcorn product line was aborted due to defective containers. Analyses undertaken included determining the cost of popcorn, the cost of popcorn bags, freight costs, as well as the projected revenues associated with popcorn sales. An assessment was also made of the supermarket outlets and territories in which the popcorn would have been sold.
- Evaluated Plaintiffs' damages claim relating to the installation of an allegedly defective computer software system at an automobile dealership. Plaintiffs contended the software had defects adversely affecting the accounting system and day-to-day operations of the dealership, and submitted an "increased cost" damages claim. Analysis demonstrated Plaintiffs' expert used an inappropriate methodology for measuring damages and submitted cost increases unrelated to the allegedly defective software.
- Other Matters. Provided deposition questions, economic analyses, and a critique of opposing economists' damage models in various business interruption cases resulting from (e.g.) fires, "lockouts", electrical outages, defective products, and/or injuries to key personnel. Businesses evaluated included a workout facility (gym), a pediatric practice, a balloon manufacturing plant, a radiology practice, and a packaging machine manufacturer.

Intellectual Property: Patent Infringement and Patent-Related Cases

- Evaluated the claimed royalty damages the owners of a patent related to the processing of documents with arbitrary XML elements were asserting against a major software manufacturer for allegedly incorporating the patented technology into its software applications. Based upon an evaluation of the historical financial performance of the Plaintiffs before and after the time of the hypothetical negotiation, market demand for and supply of products similar to the allegedly embodying products, the respective economic contributions of the Parties to the successful commercialization of the accused products, and the *Georgia-Pacific* factors, opined to an alternative royalty damages estimate. Also evaluated the four factors outlined in *eBay Inc. v. Mercexchange L.L.C.* and opined that based upon economic considerations an injunction against the accused products was not warranted.
- Analyzed Plaintiff's lost profits and reasonable royalty damages in two separate patent infringement matters relating to scanning, counting, and counterfeit detection technologies in currency discriminators. In both matters, analyzed the *Panduit* and *Georgia-Pacific* factors, constructed a hypothetical negotiation framework, conducted market and industry research, and compiled an accused product sales database. With respect to Plaintiff's lost profits-related damages, performed incremental profit analyses on lost unit sales and ancillary sales. Evaluated Plaintiff's reasonable royalty-related damages taking into account the economics associated with currency discriminator sales. Evaluated damages under a variety of scenarios based upon potential findings of infringement on patents and claims contained in these patents.

- Evaluated the claimed damages of a foam ear sleeve manufacturer who brought suit against a highperformance professional and personal audio earphone manufacturer alleging patent infringement
 relating to ear pieces having disposable compressible polymeric foam sleeves. Evaluated Plaintiff
 claimed royalty damages using market and industry data, a *Georgia-Pacific* factor analysis, and the
 changing licensing policies of the patent holder over time. Provided an alternative royalty damages
 analysis. Also analyzed from an economic perspective Defendant's countersuit of alleged patent misuse.
 Reviewed the patent holder's licensing strategy and certain provisions contained in the licenses into
 which the patent holder entered. Analyses demonstrated the patent holder's licensing strategy and the
 provisions contained in its licenses were consistent with the allegation of patent misuse.
- Evaluated Plaintiffs' claimed royalty damages in two separate patent infringement matters relating to video game controllers. The first matter related to six degrees of freedom video controller technology; the second matter related to controller-to-processor voltage technology. In both matters, conducted market and industry research, performed a *Georgia-Pacific* analysis, and evaluated company-specific and controller-related licenses. Also evaluated the key drivers of Defendant's sales including its brand name, innovative products and games, and installed base of gaming console owners. Provided an alternative royalty damages figure.
- Evaluated Plaintiff's lost profits and price erosion damages in a patent infringement matter relating to a method for delivering internet content from a network of content delivery network ("CDN") servers. The suit was brought by a CDN services provider. Evaluated Plaintiff's lost profits-related damages using market share data, adjusting for customer and market segment differences and the likelihood of supplemental sales. Evaluated Plaintiff's price erosion-related damages for selected customers for whom Plaintiff was required to lower rates and/or renegotiate contracts based upon the alleged unlawful competition of the Defendant.
- Analyzed Plaintiff's lost profits and reasonable royalty damages in two separate patent infringement matters relating to status feedback in home lighting control systems. Performed analyses on a large database of invoices relating to sales of the accused products, analyzed end-user surveys, and identified ancillary sales based upon consumer purchasing patterns. Conducted *Panduit* and *Georgia-Pacific* analyses. Calculated Plaintiff's lost sales based upon market share data reflected in industry surveys. Calculated Plaintiff's royalty damages based upon comparable license analyses.
- In a patent infringement matter relating to the air interface protocol of UMTS/WCDMA cellular phone technology, evaluated whether the Plaintiff had offered Defendant a license to the patents-in-suit on fair, reasonable, and non-discriminatory ("FRAND") terms (as required by the European Telecommunications Standards Institute's intellectual property rights policy). Analyzed the economic benefits associated with patents, the economic benefits associated with standard setting organizations, and the economic evidence related to the FRAND principles. Concluded that none of Plaintiff's licensing offers comported with FRAND principles.
- Evaluated Plaintiff's claimed lost profits in a patent infringement suit against a medical device manufacturer producing trocars with floating septum seals. Analyzed market data relating to trocar products, competitors, and market share information. Also analyzed hospital data with respect to product use and conversion between different manufacturers. Demonstrated that Plaintiff had not demonstrated Defendant would have lost sales and Plaintiff would have gained sales in the absence of the alleged infringement. Concluded a claim for lost profits was not warranted.
- Evaluated Plaintiff's claimed royalty damages asserted against a major software manufacturer in a patent infringement matter relating to a pre-fetch concept allowing for the faster loading of operating systems and software applications. Analyzed the financial performance of the patent holder at the time of the hypothetical negotiation, the drivers of demand for the products allegedly embodying the patent-in-suit, the Parties' respective contributions to the successful commercialization of the accused products, the Parties patent licensing approaches, and the relevant *Georgia-Pacific* factors. Opined to an alternative royalty damages estimate.

- Evaluated the joint venture lost profits and reasonable royalty damages in a patent infringement suit brought by a natural gas producer against an energy producer relating to a system for producing natural gas from unconventional reservoirs. Constructed an economic model incorporating complex technical and economic relationships to determine the value of the natural gas likely to be captured from the reservoirs in question. Conducted a *Panduit* factor and a *Georgia-Pacific* factor analysis.
- Evaluated claimed royalty damages in a patent infringement suit against a nutritional supplement manufacturer and distributor for the alleged infringement of two patents relating to hydrosoluble organic salts and certain compositions and methods for enhancing muscle performance and recovery from fatigue in humans. Concluded Plaintiff's expert inappropriately constructed the hypothetical negotiation framework, failed to consider non-infringing alternative compositions, and overstated the claimed reasonable royalty rate in light of licensing evidence.
- Evaluated claimed damages in a patent infringement matter relating to course management system ("CSM") products and services using the Internet to facilitate the interaction of students and instructors. Conducted a *Panduit* and a *Georgia-Pacific* factor analysis. Calculated lost profits and reasonable royalty damages. Also analyzed Plaintiff's business model and revenue types, Defendant's infringing sales based upon customer licensing agreements and contracts, Plaintiff's prior relationship with Defendant's customers, and Plaintiff's incremental profitability.
- Evaluated Plaintiff's royalty damages claim in a suit brought by a patent holding company against a major software manufacturer relating to certain pivot table functionalities in software. Opined to an alternative royalty damages figure based upon an analysis of the *Georgia-Pacific* factors, the demand for the products allegedly embodying the patent-in-suit, the failed licensing attempts by the former owners of the patent-in-suit, and the relative contributions of the Parties to the commercialization of the accused products.
- Evaluated the royalty damages allegedly suffered by a patent holder against a major internet services provider relating to a method for streaming media over the internet (which facilitated the transmission of real-time, high-quality audio information over a communications network to multiple users simultaneously). Demonstrated that the patent holder's economic expert overstated the claimed reasonable royalty rate, overstated the claimed royalty base, and reached conclusions that failed numerous reliability tests. Also demonstrated that the patent holder's economic expert failed to properly recognize the economics associated with internet radio, leading to an incorrect conclusion as to the proper royalty base that would have been agreed upon at the hypothetical negotiation.
- Evaluated claimed damages in a patent infringement matter filed by an operator of a web-based market place against a competing company relating to the submission of automobile purchase requests over the internet. Analyzed market and industry data relating to Plaintiff's line of business, Plaintiff's and Defendant's financial performance, and Plaintiff's and Defendant's respective market shares. Estimated Plaintiff's lost profits damages.
- Evaluated claimed reasonable royalty damages in a patent infringement matter involving 5 defendants relating to congestion management in ATM networks. Analysis included an assessment of sales of ATM network products allegedly containing the patented feature, an analysis of the price of the integrated circuits embodying the accused functionality relative to the price of the entire ATM product, and a review of industry license agreements. Provided alternative reasonable royalty damages based upon the *Georgia-Pacific* factors in addition to a determining the important negotiating points in a hypothetical licensor / licensee negotiation.
- Evaluated claimed reasonable royalty damages in a patent infringement matter relating to implantable rate responsive pacemakers and implantable cardioverter devices ("ICDs"). Analysis included an assessment of alleged infringing sales of pacemakers and ICDs, a review of license agreements, and an analysis of the defendant's cost savings associated with the allegedly infringing technology as compared to its next best alternative. Determined reasonable royalty damages based upon the *Georgia-Pacific* factors, and the important negotiating points in a hypothetical licensor / licensee negotiation.

- Evaluated Plaintiff's lost profits and reasonable royalty damages in a patent infringement matter relating to DVR technology. Analysis included an assessment of Plaintiff's sales of DVR products and monthly subscriptions in the absence of the alleged infringement and an incremental revenue and cost analysis. Determined reasonable royalty damages based upon the *Georgia-Pacific* factors and a determination of important negotiating points in a hypothetical licensor / licensee negotiation.
- Evaluated lost profit damages in a patent infringement matter involving blasting hole drilling rigs. At issue were the lost profits stemming from lost rig sales and lost replacement part sales. With respect to lost rig sales, evaluated the model types, geographic sales coverage, and model prices of the entities involved. Also evaluated the capacity of the Plaintiff to make the additional claimed sales. With respect to lost replacement part damages, evaluated the likely stream of replacement part sales over the life of the drilling rig. Royalty calculations were performed on sales not subject to lost profit calculations.

Intellectual Property: Theft of Trade Secrets Cases

- Evaluated Plaintiff's claimed damages in a trade secret theft case in the golf equipment industry. Plaintiff claimed disgorgement of global profits and other unjust enrichment due to the alleged misappropriation of certain golf club design trade secrets through the Defendant's sale of the company and assets to a large sporting goods company. Analysis included calculating net profits from the sale of the accused golf clubs and evaluating claimed reasonable royalty damages.
- Evaluated Defendant's assessment of the incremental costs associated with a contract to provide integrated bonusing software to a casino. The contract allegedly was won through the use of misappropriated trade secrets from the Plaintiff. At issue was the allocation of development and common costs to the contract in dispute. Also evaluated Plaintiff's antitrust counterclaim to Defendant's patent infringement suit relating to the technology used as a foundation for the integrated bonusing software.
- Evaluated damages in a theft of trade secrets matter dealing with next generation switching equipment in the telecommunications industry. At issue was the alleged theft of trade secrets when the Defendant firm hired nine employees of the Plaintiff firm. Analyzed Plaintiff's claimed inability to maintain its projected market share, the alleged accelerated entry of the Defendant firm into the next generation switching equipment market, disgorgement measures of damages, and reasonable royalty measures of damages.
- Evaluated damages suffered by a Plaintiff in the business of installing systems delivering ultra-high purity air, water, gas and chemicals to companies manufacturing integrated circuits. Plaintiff alleged a former managerial employee breached his fiduciary duty by engaging in wrongful use of trade secrets, wrongful solicitation of employees and customers, and unfair competition with the original employer. Analysis involved estimating the lost sales and lost profits to the original employer by estimating the number of bid opportunities missed because of the alleged actions of the former employee, adjusting for changing industry conditions.
- Critiqued Plaintiff's damage model in a trade secrets case in the printed circuit board industry. Plaintiff was claiming lost profits due to the misappropriation of trade secrets through Defendant's hiring of four key management personnel from the Plaintiff's company. Issues evaluated included the appropriateness of the "proxy/yardstick" approach undertaken to estimate lost revenues, and the incremental profit rates used to translate lost revenues into lost profits.

Intellectual Property: Copyright/Trademark/Trade Dress Infringement/False Advertising Cases

• Evaluated Plaintiff's claimed damages relating to the alleged failure of a TV station to deliver contracted gross rating points over a 6-year period. Plaintiff was claiming lost sales and lost profits based upon a regression analysis used to isolate a relationship between sales revenues and advertising. Demonstrated Plaintiff's regression omitted important explanatory variables (e.g., consumer income, promotions, discounts, competitors' prices, and other print and TV advertising conducted by the Plaintiff). Also demonstrated a failure to account for diminishing returns to advertising. Each of these errors served to increase the magnitude of the claimed relationship between sales revenues and advertising.

- Evaluated Plaintiff's unjust enrichment damages claims in a copyright infringement matter brought against a hospital and a construction company relating to a medical building design. Compared budgeted construction costs to actual construction costs and analyzed the revenues received by the construction company associated with the copyrighted attributes of the building design as opposed to unrelated construction costs. Also analyzed the likely demand-related reasons for revenues that would accrue to the hospital unrelated to the design of the hospital.
- Evaluated claimed damages in a false advertising matter involving tooth-whitening products between two large consumer product companies. At issue were allegedly false, misleading, and disparaging statements about Plaintiff's tooth-whitening products in comparative advertisements shown on television. Plaintiff sought to recover lost profits damages associated with reduced sales resulting from the alleged false advertising. Analyses included an evaluation and critique of Plaintiff's expert's claimed damages model including analysis of A.C. Nielsen scanner data and CMR media data. Analysis demonstrated that Plaintiff's expert did not measure properly the impact of the alleged misleading content, failed to account for alternative reasons for Plaintiff's sales declines, and implemented an incorrectly specified econometric model.
- Provided economic analysis relating to claims of unfair competition and misleading advertising in the
 pizza industry. Using economic indicia such as dollar sales revenue, trends in market share, growth in
 number of stores opened, same-store sales data, and store closure rates, evaluated whether the
 commercial success of a particular pizza company was due to customer acceptance of its pizza product or
 allegedly deceptive advertising. Also investigated the buying patterns of pizza consumers with respect to
 cross-chain patronage.
- Critiqued Plaintiff's damage claim in a matter involving alleged tortious interference with business relations and allegations of trade dress infringement. At issue was the projected sales and profitability of Plaintiff's tape dispensing machines during a period of alleged tortious interference by the Defendant and Plaintiff's simultaneous alleged trade dress infringement.
- Analyzed the lost profits of a Plaintiff in a trademark infringement case involving a law enforcement product sold through a mail-order catalog. Also analyzed the profits of the alleged infringer and the cost of remedial advertising.
- Assessed damages resulting from the alleged infringement of copyrighted training manuals. Analysis included identifying the corporate clients of the Plaintiff and Defendant firms and the reasons for customer switching unrelated to the use of the proprietary training manuals.

Intellectual Property: Commercial Success Cases

- Evaluated indicators of commercial success relating to a surgical hernia mesh fixation device employing a patented helical tacker design. Demonstrated that the patented device had achieved significant and sustained sales and sales growth. Also demonstrated that the sales of the patented device had grown faster than the sales of other hernia mesh fixation devices and achieved a majority share of sales when compared to staplers and other hernia mesh fixation products.
- Submitted a rebuttal declaration to the U.S. Patent and Trademark Office relating to the claimed commercial success of intrusion prevention system ("IPS") products asserted to practice a patent undergoing an *Inter Partes* reexamination. Opined that an economic nexus had not been established between the claimed teachings of the patent and the commercial success of stand-alone IPS products. The patent holder had not demonstrated that the claimed teachings of the patent were commercially successful separate and apart from (a) features not claimed by the patent, (b) economic factors extraneous to the claimed invention, or (c) features covered by other patents present in the IPS products.

• Evaluated Plaintiff's analysis regarding the claimed nexus between a patented technology and the commercial success of the accused devices in this patent infringement matter relating to text messaging using a limited keypad such as those found on cell phones. Analyses demonstrated Plaintiff's failed to consider many factors that lead to the commercial success of the accused devices unrelated to the patent in dispute.

Breach of Contract / Breach of Fiduciary Duty Cases

- Evaluated Counter-Plaintiff's claimed damages arising from Counter-Defendant's failure to honor a
 most-favored licensee provision in a licensing agreement relating to a semiconductor patent portfolio.
 Opined as to the economic interpretation of certain licensing terms and the differences and similarities
 between lump sum, per unit, and percentage of revenue royalty payments. Compared the licensing terms
 between the Counter-Defendant and another party with the licensing terms between Counter-Defendant
 and Counter-Plaintiff.
- Evaluated Plaintiffs' claimed damages arising from an alleged breach of contract related to the sale of a community club house and other recreational facilities in an age-restricted residential neighborhood. Plaintiffs' claimed that since they were not given the opportunity to exercise their right-of-first refusal to purchase the contested real estate assets, they lost the value of the equity associated with the real estate assets and they were required to make excessive operating expense payments. Determined that Plaintiffs' expert failed to properly consider the economic factors driving the value of the real estate assets in question.
- Evaluated Plaintiff's breach of contract damages claim relating to the use of a national brand name and other support for the development of a time share resort. Concluded Plaintiff had not demonstrated an economic causal link between Plaintiff's allegations and the quantum of damages being claimed. Adjusted Plaintiff's claimed damages for various conceptual and computational errors, including alternative actions that might have been undertaken by the Plaintiff in the absence of the alleged wrongful conduct.
- Evaluated claimed damages in an alleged breach of fiduciary duty matter between a franchisee and a major fast food franchisor relating to the development and managing of fast-food franchises. Plaintiff claimed economic harm due to franchisor's refusal to grant certain additional franchisees to Plaintiff that Plaintiff claimed would otherwise be in competition with the Plaintiff's existing franchises. Concluded Plaintiff's impact analysis failed to take into account many factors affecting the performance of the Plaintiff's existing franchises that were unrelated to the alleged wrongful conduct.
- Evaluated claimed breach of contract and misrepresentation damages in a suit brought by a global information technology company against a global professional services company relating to a joint venture agreement under which a human resources outsourcing company was formed. Analysis included conducting a client-by-client analysis regarding the specific wrongful conduct associated with each client of the joint venture and estimated the associated economic damages. Based upon certain parameters contained in the contract, also calculated the purchase price overpayment had certain performance issues come to light prior to the closing of the joint venture agreement.
- Evaluated a developer's/franchisee's damages claim against a major sandwich franchisor for the alleged breach of a five-state area development agreement. Reviewed the area development agreement, analyzed the revenues, costs, and profitability associated with franchised outlets, and estimated the Plaintiff's lost franchise fees and lost royalty income based upon various alternative scenarios discussed by the Parties.
- Evaluated the claimed damages of a calling card distribution company due to Defendant's alleged breach of a contract relating to the servicing of the calling cards. Conducted market research on the calling card industry, analyzed alternative reasons for the alleged decline in calling card sales, and evaluated Plaintiff's damages expert's report.

- Evaluated Plaintiff's damages claim concerning the alleged failure of a call center to properly process
 inquiries relating to the newspaper and television marketing of a collectible doll in the likeness of a
 recently deceased public figure. Analyzed advertising expenditures, response rates across cities, major
 news announcements related to the marketing of such merchandise, and contributing problems caused by
 Plaintiff's actions. Estimated damages by comparing sales in an un-impacted period with sales in the
 alleged impacted period.
- Evaluated Plaintiffs' damages claim relating to the underwriting and loan servicing of subprime automobile loans. Plaintiffs' contended the servicing company did not properly administer the portfolio of subprime automobile loans thereby causing excessive loan losses. Analysis demonstrated that Plaintiffs' financial experts failed to take into account alternative reasons for Plaintiffs' performance. Analysis of Plaintiffs' loan volume, interest income, loan loss rate, and deteriorating industry conditions also demonstrated that Plaintiffs' business plan did not provide a reasonable basis from which to calculate claimed damages.
- Evaluated Plaintiff's claim of lost profits relating to the collection of ballots for a Mexican telecommunication company in Mexico's Equal Access program. Analyzed a database of telephone customers, including statistics such as the length of service, average monthly consumption patterns, current billing status, and differences between residential and commercial customers. Developed an alternative claimed damages model taking into account consumption patterns and the turnover rate of customers, among other factors.
- Evaluated Plaintiffs' claim of lost success fees, lost closing fees, and underpayment of value relating to Defendant's acquisition of an oncology laboratory and the alleged failure to consummate additional acquisitions. Analysis demonstrated Plaintiffs' projections regarding the profitability of the proposed acquisitions were not reasonable given the historical financial performance of the targets. Also demonstrated Plaintiffs were not underpaid for the assets of the acquired laboratory since no investor or buyer was willing to provide funds to Plaintiffs pre-acquisition and since Plaintiffs in their valuation approach inappropriately assigned all post-acquisition synergies and gains to the Plaintiffs.
- Evaluated Plaintiff's damage claim arising from an alleged misappropriated opportunity to develop a computer superstore franchise in Mexico based on the equivalent U. S. concept. Demonstrated Plaintiffs overstated per store revenue, understated store-level costs, and used inappropriate financial and strategic assumptions regarding the number of stores opened, the amount of capital required, outside investor contribution, equity shares, and strategic acquisitions. Plaintiffs also conducted a valuation based on companies bearing little or no resemblance to a computer superstore.
- Evaluated Plaintiff's claim of lost profits arising from an alleged breach of contract involving two
 tubular inspection equipment manufacturing companies. Analyses demonstrated that Plaintiff's expert
 overstated the projected utilization rate of the company's equipment and associated revenue and
 understated the projected incremental costs that would have been incurred by Plaintiff. Analyses
 demonstrated market demand would not support the equipment utilization rate projected by Plaintiff's
 expert.
- Evaluated Plaintiff's claim of damages in a breach of contract matter in the magazine publishing and distribution industry. Plaintiff claimed Defendants breached a distribution agreement by suspending distribution pending the resolution of a trademark infringement dispute. Plaintiff abandoned the magazine, claiming lost profits and the estimated lost value of the magazine had it been sold after its fourth year of publication. Analysis demonstrated Plaintiff's expert overstated subscription-based revenues, distorted the cost/revenue structure that would have existed for the magazine, and overstated the likelihood of success by ignoring the failure of similar genre magazines.

- Evaluated the damages sustained by the public safety division of an information technology services firm due to the early termination a ten-year services agreement to provide enhanced 9-1-1 services to a governmental agency. One-time up-front implementation costs in setting up the 9-1-1 system and ongoing operational costs were compiled in constructing a cost reimbursement damage claim. Also evaluated the reasonableness of an early termination charge schedule designed to represent the one-time buyout total if the governmental entity opted to terminate the contract before the ten-year term expired.
- Evaluated the damage claim of a bank arising from an allegedly defective conversion of the bank's data processing system. Areas investigated included the softening macroeconomic environment surrounding the bank during the relevant time period, the changing financial services market, internal bank ratios, and technical flaws contained in Plaintiff's damage calculations.
- Estimated lost sales and lost royalty payments to a "thick" potato chip producer due to a breach of contract. Involved was the construction of a damage model, analyses of the market for potato chips and per capita potato chip consumption, and projecting the rate of introduction of a new potato chip into regional markets.
- Calculated damages and provided other economic analyses in a "lack of best efforts" breach of contract case in the carbonated soft drink industry. At issue was the impact on sales due to the "lack of best efforts" vs. the impact on sales from contemporaneous new entrants into the market.
- Calculated damages in a breach of contract matter involving an association of nephrologists and a management company operating 12 kidney dialysis clinics. Areas of investigation included the "profitability available for distribution" from the clinics, the projected rate of growth in patients, the rate of introduction of new clinics, and the costs associated with running the clinics. A damage model was developed which projected the profits that would have been distributed to the management company over the life of the contract in the absence of the breach.
- Evaluated claimed damages against a hospital for allegedly breaching a contract allowing hyperbaric oxygen services on hospital premises. Investigations included assessing the local market for hyperbaric services, evaluating Plaintiff's business growth potential given the physical space constraints at the hospital, and demonstrating Plaintiff had fully mitigated claimed future damages through the establishment of an alter ego firm at a nearby local hospital.

Class Certification Engagements

- Evaluated Plaintiff's position that the claimed economic injury suffered by putative Class members could be quantified on a Class-wide basis in a class action matter relating to anti-aging skin care products marketed as preventing and repairing signs of aging "in just one week." Demonstrated that the approaches proposed by the opposing expert to calculate Class-wide damages would not yield reliable or relevant estimates of the alleged harm suffered by individual Class members. Arguments presented included that the large number of repeat buyers, the wide variations in the retail prices associated with the accused products, and the wide variations in the retail price differences relative to other anti-aging products would prevent a reliable calculation of putative Class members' damages on a Class-wide basis.
- Evaluated Plaintiffs' position that the claimed economic injury allegedly suffered by putative Class members could be quantified on a Class-wide basis in a matter brought by an institutional investor against a bank associated with the bank's securities lending program. Demonstrated that a class-wide approach would obfuscate important differences among putative Class members' individual investment expectations and tolerances. Differences requiring individualized inquiry included the variability in maturity guidelines, credit-quality guidelines, prohibited investments, and diversification requirements.

- Evaluated Plaintiffs' position that the claimed economic injury allegedly suffered by putative Class members could be quantified on a Class-wide basis in a matter where a beverages company marketed certain beverages as containing beneficial vitamins and allegedly failed to disclose the sugar content of the beverages. Evaluated the wide variations in the beverages' retail prices across distribution outlets, across geographic areas, and across the time periods considered. A comparison of the average retail prices of the at-issue beverages relative to identified benchmark products did not support the allegation that the at-issue beverages possessed a systematic price premium as a result of the company's allegedly misleading marketing campaign.
- Evaluated Plaintiffs' position that the claimed economic injury allegedly suffered by putative Class members could be quantified on a class-wide basis in a matter where an automobile company allegedly did not inform purchasers that actual vehicle miles per gallon performance could vary from the 40 miles per gallon EPA estimated fuel efficiency. Demonstrated that individualized inquiry would be required to ascertain consumers' valuation of vehicle characteristics (including their expected fuel economy) when purchasing an accused vehicle, actual prices paid, driving patterns, driving conditions, and whether putative Class members' expectations were influenced by the company's alleged wrongful conduct. Evaluated Plaintiffs' class certification expert's opinion that alleged damages could be evaluated on a class-wide basis using a hedonic regression methodology.
- Evaluated Plaintiffs' position that the claimed economic injury allegedly suffered by putative Class members could be quantified on a class-wide basis in a matter relating to the issuance of a special assessment fee by a timeshare vacation club. Demonstrated that potential damages-related conflicts were likely to arise among putative Class members (including among the Named Plaintiffs) making Class-wide proof an unreliable measure of economic injury for each putative Class member. Also demonstrated that evaluating claimed damages on a Class-wide basis would result in potentially awarding damages to putative Class members who suffered no injury.
- Evaluated Plaintiffs' position that the economic injury allegedly suffered by putative class members could be quantified on a class-wide basis in a matter where a beverages company marketed certain beverages as "All Natural" when they contained high fructose corn syrup ("HFCS"). Demonstrated that wide variations existed in the beverages' retail prices across distribution outlets, across geographic areas, and across the time periods considered. Also demonstrated that wide variations existed in the beverages' retail prices because of promotional discounts and coupons and because the company did not sell directly to consumers. Consequently, whether consumers paid a price premium because of the "All Natural" labeling (and how much, if any) could not be determined by proof common to the proposed class. A comparison of the average retail prices of the "All Natural" beverages in dispute to identified benchmark products did not support the allegation that the "All Natural" beverages possessed a systematic price premium as a result of the "All Natural" labeling.
- Evaluated the commonality of purchasing circumstances of proposed Class members in a class action matter against a national quick service restaurant ("QSR") chain. Plaintiffs alleged the QSR misrepresented the trans fat levels contained in the QSR's french fries. Plaintiffs also alleged the proposed Class paid a price premium for certain food products based upon the alleged misrepresentations. After reviewing survey data, marketing materials, and pricing data, concluded that individual inquiries were required to establish different customer's awareness of the alleged misrepresentations, different customer's reliance upon the alleged misrepresentations in their purchasing decisions, and other important economic factors impacting each customer's purchase decision.

• Evaluated Plaintiffs' claim that Class members' alleged damages could be "mechanically calculated" in a class action matter against a payphone company's auditor. The payphone company had filed bankruptcy and the Class members alleged the auditor misrepresented the company's financial statements, upon which the Class members allegedly relied. Conducted economic and market research and identified factors that caused a general decline in the payphone industry which contributed to the bankruptcy of the company. Analyzed the claimholders' database and identified issues relating to the database that precluded Plaintiffs' expert from mechanically calculating the damages allegedly suffered by class members.

Lender Liability Cases

- Evaluated Plaintiff's allegations that it was capital constrained and consequently economically damaged as a result of its loans being placed into the special assets department of its lender. Analyzed the Plaintiff's unused cash, credit, and other available funds. Also analyzed Plaintiff's successful access to the capital markets, acquisition spending, R & D spending, sales performance, and profitability relative to peer companies.
- Analyzed Plaintiffs' damage claim in a lender liability suit relating to Defendant's alleged failure to fund
 certain residential housing development and construction loans. Evaluated Plaintiffs' changing five-year
 business plan projections, including revenue growth, geographic expansion, market share, salesmen
 coverage, cost structure, and profitability assumptions. Also evaluated Plaintiffs' strategy for "exiting"
 the business and the alleged value of their ownership at that time.
- Evaluated damages in a lender liability case involving the bankruptcy of a gear manufacturing company.
 The bankruptcy was allegedly due to the failure of a bank to fully fund a previously committed loan.
 Investigations included researching alternative market-related reasons for the decline in the gear manufacturer's business as well as evidence of internal mismanagement on the part of the company's owners.
- Other Matters. Evaluated damages, causation issues, and liability issues in various lender liability cases involving the calling in of loans, the failure to fund previously committed loans, the failure to release collateral, and the misappropriation of loan payments. Cases involved firms in the wire and cable, drywall/construction, PVC piping, and auto dealership industries, among others.

Professional Negligence (Non-Securities / Non-Merger) Cases

- In an alleged professional negligence matter, a lender to distressed companies sought \$40 million in damages from an auditor in connection with a \$130 million credit facility extended to an HDTV company. The lender failed to collect when the borrower filed for bankruptcy. The auditor was alleged to have made negligent misrepresentations associated with the borrower's financial statements; the lender asserted it had relied upon the borrower's financial statements when entering into the credit facility. Performed economic causation and damages-related analyses. Identified the known or knowable risks associated with providing a credit facility to the borrower, including certain accounts receivable collection risks and market softness risks. Opined that it was the materialization of these known and knowable risks that caused the lender's claimed losses.
- Evaluated claimed damages against a major law firm for alleged professional negligence when filing a patent for the treatment of septic shock. Researched (among other things) the FDA approval process, associated statistics regarding the product category allegedly covered by Plaintiff's patent, and various industry projections regarding the category growth. Performed a discounted cash flow analysis, an incremental profitability analysis, a licensing analysis, and provided an alternative calculation of claimed damages.

- Evaluated Plaintiffs' claimed damages relating to an alleged failure by a law firm to properly file certain patent applications relating to a video processor recorder. Plaintiffs' business opportunities and licensing fees in the United States and Europe were allegedly lost due to the ensuing delays. Analyzed Plaintiffs' causation linkages to claimed damages, length of the claimed damages period, forecasted units sold, forecasted market share, forecasted costs of production, and claimed licensing rate.
- Evaluated claims by a Department of Insurance appointed liquidator that alleged the auditor of a bankrupt insurance company breached its fiduciary duty, resulting in a \$100 million deficit on the insurance company's books. Conducted various analyses of a claims register database, including a comparison of indemnity payments and reserves per claim before and after the appointed liquidator took control of the liquidation process. Analyses demonstrated both the indemnity payments and reserves per claim were higher after the appointed liquidator took over the liquidation process, implying the liquidator over-paid and over-reserved claims.

Entertainment/Sports-Related Engagements

- Evaluated the claimed damages of a movie production company against a major home video rental
 company. At issue was the claim that the refusal of the home video rental company to commit to carry a
 particular movie in its stores caused the movie production company to suffer lost profits when its
 distributor then refused to release the movie theatrically. Demonstrated that Plaintiff's methodology for
 estimating lost box office revenues was inappropriate and failed to account for important determinants of
 movie attendance.
- Analyzed Plaintiffs' lost profits and reasonable royalty damages in a patent infringement matter relating to offset head lacrosse sticks. Analysis included an assessment of Plaintiffs' sales in the absence of the infringement, the distribution of the lost sales to the models that would have been sold in the absence of the infringement, and an incremental revenue and cost analysis. Also analyzed Plaintiffs' competitors, pricing patterns, productive capacity, and geographic coverage in support of the lost profits claim. Reasonable royalty damages were assessed using the Georgia-Pacific factors and a determination of important negotiating points in a hypothetical licensor / licensee negotiation.
- Estimated the diminished box office revenues suffered by a theatrical release due to the breach of a quick service restaurant promotional tie-in arrangement with a major pizza chain. Developed a database of recently released films and related film characteristics such as genre, rating, critics review, box office revenues, media spending, production budget, season of release, and talent. A regression model was then developed to quantify the relationship between media spending and box office revenue. An industry review of quick service restaurant promotional tie-in arrangements was also conducted.
- Evaluated Plaintiffs' claimed damages in a breach of contract matter involving the sale of certain minority interests in a National Basketball Association team. At issue were Plaintiffs' tag-along rights whereby limited partnership interests could be included in any sale by the general partner on the same terms and conditions. Damages were calculated as the difference between the formulaic value of the minority interests versus the market value of the minority interests when sold separately. Discounts for lack of control and reduced marketability were analyzed.
- Evaluated Plaintiff's damages claim relating to a NASCAR racing team sponsorship agreement. Plaintiff contended the Internet service provider sponsor interfered with the racing team's ability to sell advertising banners that were part of the sponsorship agreement. Analyses included assessing the appropriate methodology for valuing a NASCAR race team and assessing comparable transactions. Also analyzed the financial performance of the race team, the economic terms of the sponsorship agreement, and the risks associated with a barter arrangement.
- Estimated damages arising from a breach of contract claim between an electronic retailer and a local television station. At issue was the lost profits to the electronic retailer when the local television station discontinued broadcasting the electronic retailer's programming.

- Analyzed the market and evaluated damages on behalf of a television station denied access to a cable system. At issue was whether the cable operator was attempting to monopolize the market for local television advertising. Analysis included an estimation of the advertising revenues that would have been received by the local television station had it been allocated a channel on the cable system.
- Estimated damages arising from a breach of contract claim between a video-cassette manufacture/distributor and a theatrical motion picture producer/distributor. At issue was whether the motion picture distributor manipulated the theatrical release of certain titles distorting the films the video-cassette producer could distribute under the terms of the agreement.

Tax-Related Engagements

- Participated in an analysis of the impact on tax revenues to the State of Texas from a change in tax laws relating to pension fund managers. Helped demonstrate that changing the apportionment rule from "location in which the investment services were performed" to "residence of the investment beneficiaries" would not result in a negative fiscal impact.
- Served as consulting partner on an engagement estimating qualifying research and expenditure costs in response to certain expenses disallowed by the IRS. Analysis included developing a methodology to estimate qualifying hours and qualifying costs for groupings of employees with missing data.
- Analyzed whether the salaries paid to the owners/managers of a heavy and highway construction company were reasonable in a matter before the IRS. Areas investigated included the cyclical nature of the construction industry, the resulting cyclical nature of compensation paid to construction industry executives, and the 50th and 75th percentile salaries paid to various types of executives in the construction industry.
- Participated in an analysis of the tax benefit versus detriment to a Plaintiff as a result of ownership in certain partnership interests over the 1982-1998 time period. Also involved was an analysis of cumulative suspended tax losses, partnership income available for distribution, and changing tax rates over time.
- Quantified the net out-of-pocket cash position of investors who purchased limited partnership interests in nine real estate partnerships in an alleged non-disclosure matter. Also quantified the impact caused by changes in the Federal income tax laws. Supporting analyses included comparing the actual and projected performance of the partnerships taking into account restructurings, re-financings, and dissolutions.

Personal Injury and Wrongful Death Cases

- General Overview (Personal Injury). Assessed damages and lost earnings in various personal injury cases involving movie production workers, management consultants, financial consultants, nurses, medical doctors, chiropractors, secretaries, truck drivers, airline stewardesses, mechanics, engineers, maintenance personnel, carpenters, masonry workers, crane operators, machine operators, actresses, military aircraft production workers, tankermen, teachers, film editors, portfolio managers, hair stylists, automobile assemblers, landscape architects, sole proprietors, and real estate agents (among others). In each case, issues investigated included an assessment of the projected undamaged income, damaged income, expected work life of the individual, and appropriate discount rate to use. Assistance to the attorney included the preparation of deposition questions, economic analyses, and a critique of the opposing economist's damage model.
- General Overview (Wrongful Death). Developed numerous damage models in wrongful death cases. Issues investigated included the projection of lost earnings, the projected personal consumption expenditures of the decedent, and projected lost pension benefits. Professions of the decedents included various types of entrepreneurs (e.g., boat store owners, etc.), white-collar workers (e.g. attorneys, architects, etc.), and blue-collar workers (e.g., demolition contractors, grocery store clerks, etc.). Ages of the decedents ranged from adults to teenagers to children.

• Evaluated claims of damages submitted by the family members of 88 decedents from an airplane crash. Family members were seeking damages in state and federal courts against the airline and certain parts manufacturers. Most of the decedents resided and worked in Asian countries. Researched various data sources for information regarding social security benefits, interest rates, and the relevant economic statistics for workers in these countries. Evaluated four Plaintiff damages experts' reports and testimonies, summarized our evaluation of these damage models, and calculated alternative damages figures. Analysis included evaluating lost earnings, lost business value, lost non-salary benefits, lost retirement funds, and lost savings.

Wrongful Termination Cases

- Evaluated Plaintiff's alleged lost earnings and lost future earnings capacity in a matter against a major shipping company in which the Plaintiff claimed to have resigned his legal counsel position due to the Defendant's alleged criminal conduct and its refusal to conduct an independent investigation. Analyzed various employee benefits offered by the Defendant including but not limited to the salaries of similarly-situated employees, long term incentive plans, 401(k) plan, paid vacation, stock options, and retirement benefits. Also analyzed promotion criteria, similar benefits received by the Plaintiff at alternative employment, and the lower cost of living associated with the geographical location of the alternative employment.
- Evaluated Plaintiff's claimed economic harm in a wrongful termination / negligent misrepresentation matter. Plaintiff claimed that pre-termination certain representations by the company dissuaded him from resigning and selling his stock holdings, thereby causing economic harm from the subsequent decline in the company's stock price. Analysis included quantifying the salary, bonuses, pension benefits, and severance pay the Plaintiff received during the additional time spent with the company as compared to the stock price declines that formed the basis of Plaintiff's damages claim.
- Evaluated Plaintiff's loss of earnings claim in an alleged wrongful termination matter in the long distance telecommunications industry. Plaintiff was an independent representative with a "downline" working for a company using a multilevel marketing sales approach. Analyzed the Plaintiff's historical earnings, business expenses, and the earnings of Plaintiff's peers to evaluate Plaintiff's net earnings in the absence of the alleged wrongful termination.
- Evaluated Plaintiff's damage claim in a wrongful termination matter involving an insurance broker/branch manager. Evaluated Plaintiff's alleged damage period, earnings in the absence of the termination, fringe benefits, business expenses, and offsetting earnings. The sales patterns of the relevant insurance products at the state and national level were incorporated into the analysis. Also analyzed trends within the company with respect to branch manager positions.
- Evaluated the damages suffered by the manager of an over-the-counter trading department in an alleged wrongful termination action. Since the compensation of the manager was based on the profitability of the department, one issue investigated was the reason for the decline in the post-termination performance of the department.
- Other Matters. Assessed damages and lost earnings in other wrongful termination cases involving internal medicine specialists, neurosurgeons, anesthesiologists, entertainment company executives, brokers/traders, secretaries, accountants, attorneys, quality assurance managers, company presidents, real estate brokers, property managers, insurance brokers/managers, and military aircraft production workers. Areas investigated include many of the same items as described in personal injury cases.

Other Economic Engagements

- Conducted an economic analysis of historical and projected lost revenues due to SEC-related independence constraints for an information technology consulting entity. The analysis demonstrated that SEC rules requiring SEC registrants to disclose the amount of non-audit fees paid to its auditor, as well as constraints on the consulting entity's ability to perform outsourcing or managed application services for audit clients significantly impacted business growth relative to the market and its closest competitors. The analysis also demonstrated that certain revenue projections assuming independence relief were appropriate in light of market conditions and the independence constraints.
- Conducted an economic cost/benefit analysis of the SEC's proposed rule changes relating to non-audit services performed by auditing firms for audit clients. Analyses demonstrated that public accounting firms have an incentive to protect their brand name capital and that purchasers of non-audit services have an incentive to maintain investor confidence in the reliability of the audited financial statements.
- Performed an economic impact analysis on behalf of a major pipeline corporation seeking to gain regulatory approval for the construction of an oil pipeline in the Pacific Northwest. Evaluated the net economic impact of the project on employment, income, and consumer expenditures in the region. New employment opportunities resulting from construction and maintenance of the pipeline were compared to the potential lost jobs associated with the alternative means of transporting the petroleum.
- Participated in a major antitrust risk assessment exercise for a large industrial corporation. Work
 performed included evaluating the major litigation risks in the areas of monopolization, price
 discrimination, price fixing, illegal tying, and exclusive dealing. A detailed questionnaire designed to
 collect relevant economic data and identify potential risks was constructed and sent to the corporation's
 division managers.
- Evaluated revenue projections relating to an electronic toll collection system. The system was designed to recover lost toll revenue and other administrative fees from toll violators traveling along a consortium of tollways in New York, New Jersey, and Delaware. Analyzed four critical revenue drivers in the projections (number of transactions, violation rates, citation rates, and collections rates) and the potential variability of certain components of the projections by compiling comparative data through interviews with industry participants. Analysis was used in assisting lenders evaluating the economic viability of the project.
- In a bankruptcy matter, analyzed the expected rate of return that could be earned on a portfolio of assets. Included in the analysis was determining the investment portfolio of a prudent pension fund manager and the historical risk premiums earned on each category of assets in the portfolio. The assets were being held to meet future pension plan liabilities.
- Conducted an analysis of low-cost housing in Los Angeles County (CA) to determine whether sufficient housing was available to house the County's general relief recipient population. In separate engagements, conducted similar studies for San Bernardino County (CA) and Alameda County (CA). The Alameda County study also analyzed earned income incentives and food stamp allotments as a source of income in addition to the County's monthly general relief assistance. An affordable housing analysis was also conducted for the State of New Jersey's Department of Health relating to the state's child exclusion policy and AFDC recipients.
- Conducted an economic analysis on behalf of the California Public Utilities Commission. Tasks included incorporating elasticities into alternative rate design and pricing models, analyzing subsidies accruing to various residential consumer groups under alternative rate designs, and estimating the relative welfare loss associated with each alternative rate design.

Fraud/Criminal-Related Engagements

- Evaluated claimed damages in a suit brought by Plaintiff relators against a major information technology company for allegedly submitting false and fraudulent claims to the U.S. government under a Medicaid program providing health-cost reimbursements to school districts. Conducted various benchmarking analyses including analyzing a "claimed amount" versus "paid" pattern analysis and a reimbursement rate analysis across Defendant-administered school districts and non-Defendant-administered school districts. Also conducted a reimbursement rate benchmarking analysis associated with school districts before and after administration by the Defendant. Concluded there was no economic evidence of a systematic effort to defraud the U.S. government.
- Evaluated Plaintiff's claim of damages stemming from the alleged embezzlement of funds and falsification of income statements by a bank official relating to a mortgage lending division of a bank. Analysis identified errors made by the bank in specifying the length of the damage period and not properly accounting for accounts receivable collections made post-discovery of the alleged illegal acts.
- Analyzed skilled nursing facility nursing ratios in a criminal health care fraud matter relating to
 Medicare reimbursements. At issue was Defendant's ratio of skilled nursing costs to unskilled nursing
 costs alleged to be outside of governmental guidelines. Analyzed facility-level ratios by establishing
 peer groups of facilities based upon size of facility, number of participating beds, skilled utilization
 percentage, state location, average length of stay, and facilities with similar levels of acuteness.
- Estimated freight overcharge damages on behalf of a major multinational information technology services firm. Analysis required the utilization of a database of all freight shipments made over a five-year period, including incorporating subsequent credit memos, discounts, and dimensional weight charges. Analysis compared actual freight charges to rates charged by alternative carriers for shipments of identical ship method (e.g., ground, next day, two day), weight, and destination.
- Performed economic analysis relating to a health care criminal matter in which a group of doctors and a
 hospital were alleged to have conspired to receive remuneration in return for the referral of Medicareeligible patients. Analyze included evaluating the savings from reduced admissions rates and from
 reduced average length of stays. Also analyzed the profitability of certain laboratory-related work.

TEACHING EXPERIENCE

Macroeconomic Principles and Intermediate Macroeconomics

Topics covered included unemployment/full employment, inflation/price stability, economic growth/gross domestic product, determination of national income, and monetary and fiscal policies.

Microeconomic Principles and Intermediate Price Theory

Topics covered included functioning of markets (demand and supply analysis), elasticities, theory of the firm (profit maximization), industry performance, allocation of resources, and government regulation.

Companies In Crisis

Topics covered included companies, markets, and industries in contemporary crisis situations from external or internal changes in the operating environment or significant conflict. Topics included case studies focusing on solutions for companies facing competitive issues, management issues, or litigation-related issues.

PUBLICATIONS

"An Economic Framework for Analyzing Covenants Not to Compete" (with Elaine Fleming and Steven Herscovici), Expert Witnesses, ABA Section of Litigation, Spring/Summer 2011, Vol. 7 No. 1.

"Financial Expert Witness Challenges and Exclusions: Results and Trends in Federal and State Cases Since Kumho Tire" (with Lawrence F. Ranallo), <u>Accountants' Handbook</u>, Tenth Edition 2004 Supplement, edited by D.R. Carmichael, New York: John Wiley & Jones, Inc., 2004.

"Accounting for Damages in Intellectual Property Litigation" (with Tony Samuel and John Davis), Building and Enforcing Intellectual Property Value – an International Guide for the Boardroom 2003.

"Challenges to the Admissibility of Financial Expert Witness Testimony" (with Lawrence F. Ranallo), <u>Litigation Services Handbook</u>, 2002 Supplement, edited by Roman L. Weil, Michael J. Wagner, and Peter B. Frank, 2A.1 – 2A.17, New York: John Wiley & Sons, Inc., 2001.

"Calculation of Lost Earnings" (with Carlyn R. Taylor and Randi L. Firus), <u>Litigation Services Handbook</u>, edited by Roman L. Weil, Michael J. Wagner, and Peter B. Frank, 11.1 – 11.16, New York: John Wiley & Sons, Inc., 2001.

"Preparing the Financial Expert or Economist" (with George G. Strong, Jr.), Witness Preparation, V. Hale Starr, 13.4 – 13.4.1, New York: Aspen Law & Business, A Division of Aspen Publishers, Inc., 1998.

"The Effect of Institutional Setting on Behavior in Public Enterprises: Irrigation Districts in the Western States" (with John M. McDowell), <u>Arizona State Law Journal</u>, Vol. 1982, No. 2, 453 – 496.

SELECTED RECENT CLIENTS

Selected recent clients (past five years) include but are not limited to: Admiral Beverage; Alphatec Holdings, Inc.; Amazon.com, Inc.; AMS Sensors; Ashley Furniture Industries, Inc.; BBB Industries, LLC; B/E Aerospace, Inc.; Best Buy Co., Inc.; Bombardier Recreational Products Inc.; Buffalo Rock Company; Celsius Holdings, Inc.; Clear Channel Outdoor Holdings, Inc.; CommScope Technologies, LLC; ConAgra Foods, Inc.; Costco Wholesale Corporation; Covidien LP; Daimler Truck North America LLC; Dentsply Sirona Inc.; Diageo Beer; Dril-Quip, Inc.; Dropbox, Inc.; FCA US LLC (Chrysler); Fieldturf; Fitness Equipment Services, LLC (Sole Fitness); The Gillette Company LLC; Glaukos Corporation; Goli Nutrition, Inc.; Google LLC; Hill's Pet Nutrition, Inc.; Hunting Titan, Inc.; IGT; iRobot Corporation; Keurig Green Mountain; Kimberly-Clark Corporation; L'Oreal USA, Inc. and Matrix Essentials, LLC; LensCrafters; LG Electronics, USA, Inc.; Medtronic, Inc.; Micron Technology, Inc.; Microsoft Corporation; Music Choice; Nestlé Purina PetCare Company; PharmaCare U.S., Inc.; Red Bull Racing, Ltd.; Samsung Electronics Co., Ltd.; Spirit AeroSystems; Sprint Communications Company, LP; Sunoco Partners Marketing & Terminal L.P.; Toyota Motor Corporation; Universal Alloy Corporation; Verizon Wireless; WalMart Inc.

HONORS

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IAM Patent 1000 2014 – The World's Leading Patent Practitioners. (Pages 648 and 666.) IAM Patent 1000 2015 – The World's Leading Patent Practitioners. (Pages 727 and 759.) IAM Patent 1000 2016 – The World's Leading Patent Practitioners. (Pages 740 and 762.) IAM Patent 1000 2017 – The World's Leading Patent Practitioners. (Pages 791, 795, and 822.) IAM Patent 1000 2018 – The World's Leading Patent Practitioners. (Pages 832 and 862.) IAM Patent 1000 2019 – The World's Leading Patent Practitioners. (Pages 892 and 941.) IAM Patent 1000 2020 – The World's Leading Patent Practitioners.
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GCR Global Competition Review Who's Who Legal: Competition 2016 (Economists). (Page 176.)

D CEO: The Most Powerful 500 Business Leaders In Dallas – Fort Worth, 2017 Edition. (Page 152.) D CEO: The Most Powerful 500 Business Leaders In Dallas – Fort Worth, 2018 Edition. (Page 160.)