



EQUITY RISK SCIENCES, INC
Institutional Investment Data Analytics

200-COMPANY BANKRUPTCY STUDY

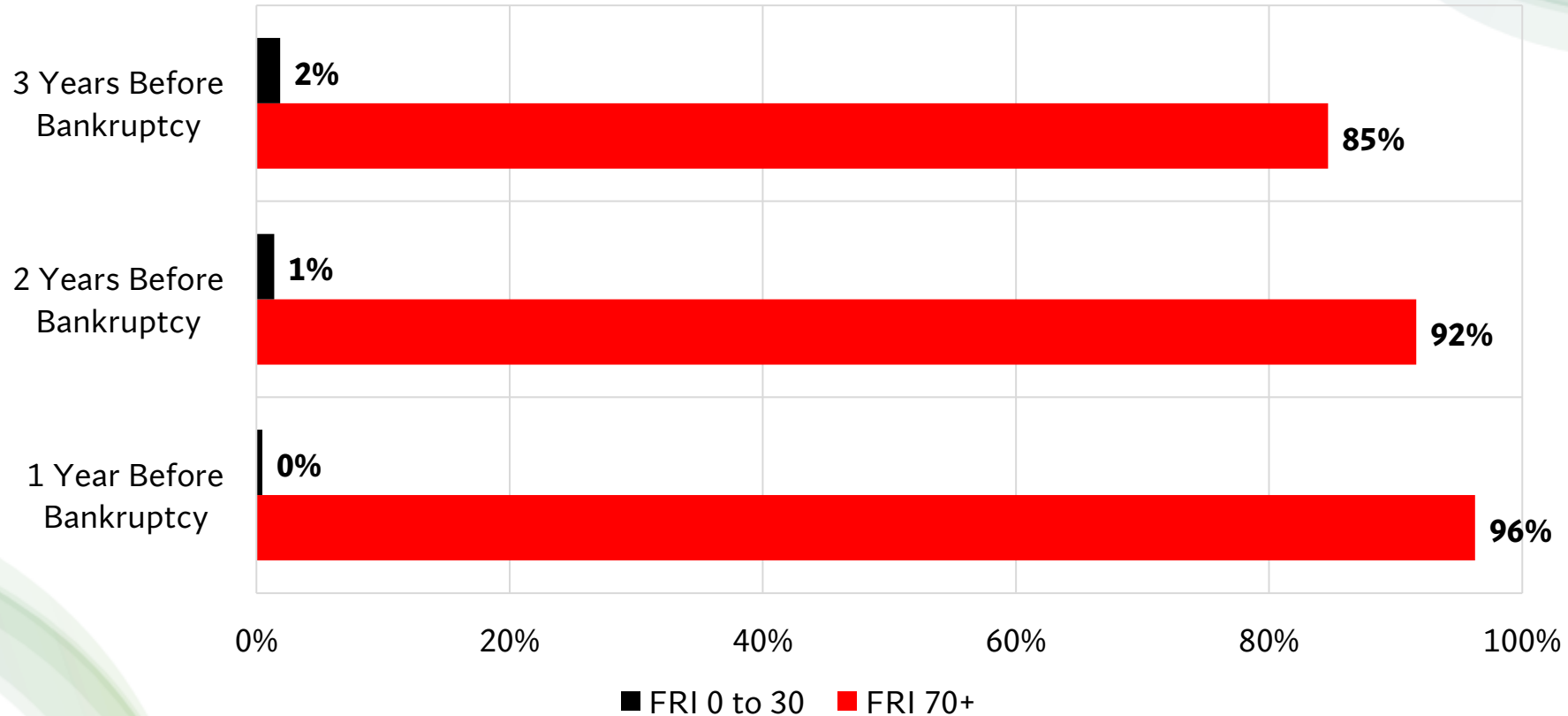
April 17, 2019

OVERVIEW

- Goal: Determine if ERS's technology can provide an “early warning” for companies at risk of bankruptcy.
- Period: 12/30/2003 to 4/17/2019
- Method:
 - Identified 200 bankrupt companies with a high market cap of at least \$800 million, delisted 12/30/2003 or later.
 - Obtained their stock prices for each of the preceding 7 years before they were delisted.
 - Calculated ERS's Price Risk and Financial Risk indicators for each of the 7 years prior to their delisting.
 - For dates on which ERS could not calculate a company's Price Risk or Financial Risk, those companies were excluded
 - ERS used the larger of the Price Risk or Financial Risk indicators
 - Calculated the percentage decline for each stock in the time periods prior to their delisting.

ERS's RATINGS WARN OF POTENTIAL BANKRUPTCY

ERS correctly identified 92% of 200 bankrupt companies at least two years prior to their delisting.



HOW MANY OF THESE 200 NAMES DO YOU RECOGNIZE?

4 Kids Entertainment	A123 Systems	Abitibibowater	Adelphia Communications	Advanta
Allied Nevada Gold	Alpha Natural Resources	Ambac Financial Group	American Home Mortgage	Angiotech Pharmaceuticals
Arch Coal	ARO Liquidation	Atherogenics	Atlas Air Worldwide Holdings	Atlas Resource Partners LP
Atp Oil & Gas	Aventine Renewable Energy	Bankunited Financial	Bearingpoint	Bethlehem Steel
Bon-Ton Stores	Borders Group	Boyds Collection Ltd	Bpz Resources	BreitBurn Energy Partners
Cal Dive International	Calpine	Central European Distribution	Cenveo	Champion Enterprises
Charter Communications	Chiquita Brands International	Christopher & Banks	Circuit City Stores	Cit Group
Citadel Broadcasting	Cobalt Intl Energy	Coldwater Creek	Collins & Aikman	Colonial Bancgroup
Corus Bankshares	Countrywide Financial	Covad Communications	Credence Systems	Cumulus Media
Dana	Delphi	Delta Air Lines	Delta Petroleum	Dendreon
DEX ONE	Downey Financial	Earthshell	Eastman Kodak Co	Ener1
Energy Conversion Devices	Enron	Epl Oil & Gas	Erin Energy	EV Energy Partners
Evergreen Energy	Evergreen Solar	Exide Technologies	Fairway Group Holdings	Federal Mogul
Firstfed Financial	Fleming Companies	Flyi	Footstar	Frontier Financial
Furniture Brands International	Genco Shipping & Trading Ltd	General Maritime	General Motors	Global Power Equipment
Globix	Gmx Resources	Goodrich Petroleum	Great Atlantic & Pacific Tea	GulfMark Offshore
Hearst Argyle Television	Hercules Offshore	hhgregg	Hooper Holmes	Horsehead Holding
Hutchinson Technology	Idearc	Indymac Bancorp	Interstate Bakeries	Ipix
Irwin Financial	Itt Educational Services	Ivanhoe Energy	Jackson Hewitt Tax Service	James River Coal CO
Jones Energy	Kid Brands	Kior	KIT digital	K-V Pharmaceutical Co

HOW MANY OF THESE 200 NAMES DO YOU RECOGNIZE?

Leap Wireless International	Lear	Lehman Brothers Holdings	Liberate Technologies	Linn Energy Llc
LinnCo LLC	Lodgian	Loral Space & Comms	Magnum Hunter Resources	Mdi
Memorial Production Partners	Meruelo Maddux Properties	Midstates Petroleum	Midway Games	Milacron
Molycorp	Monaco Coach	Movie Gallery	Mti Technology	Nanogen
New Century Financial	NexCen Brands	Nii Holdings	Nortel Networks	North American Palladium
Northwest Airlines	Nuverra Environmental	Oca	Oilsands Quest	Orexigen Therapeutics
Overseas Shipholding Group	Owens Corning	Pacific Sunwear Of California	Paragon Offshore Plc	Parker Drilling Co
Patriot Coal	Peabody Energy	Penn Virginia	Peregrine Systems	Pff Bancorp
Pmi Group	Point Blank Solutions	Powerwave Technologies	Primus Telecomms	Quantum Fuel Systems
Quicksilver Resources	Quicksilver	R H Donnelley	Radioshack	Ramp
Raser Technologies	RCS Capital	Redback Networks	Republic Airways Holdings	Rex Energy
Riverstone Networks	Sandridge Energy	Savient Pharmaceuticals	School Specialty	Sears
Seventy Seven Energy	SFX Entertainment	Silicon Graphics	Sirva	Six Flags Entertainment
Smurfit Stone Container	Solutia	Spansion	Spectrum Brands	Spiegel
Standard Register Co	Stone Energy	Storm Cat Energy	Sulphco	Sunedison
Swift Energy Co	Synergy Pharmaceuticals	Terrestar	Thornburg Mortgage	Thq
TLC Vision	Tousa	Tower Automotive	Triangle Petroleum	Trident Microsystems
Trinity Capital	Tumbleweed Comms	Ual	Ucbh Holdings	Ultra Petroleum
Unilife	Valence Technology	Verasun Energy	Visteon	Walter Investment Mgmt
Washington Mutual	Wave Wireless	Wci Communities	Winn Dixie Stores	Worldcom