The Mid-Term Presidential Term Year and Stock Market Returns

This study demonstrates that meaningful and significant correlations to positive outcomes produced by the U.S. stock market have been identified through the use and analysis of the data set representing the four year U.S. "Presidential term cycle".

The "Presidential term cycle" lasts for four years and consists of: the Post election year (1st year), the Mid-term year (2nd year), the Pre-election year, and the Election year (4th year). Research has shown that during the "Mid-term" year, the stock market has tended to find an interim "low point" within the market "trend" (1). Chart 1 below displays an "aggregate" representation of stock market price trend behavior over all four of the Presidential term cycle years from 1900 - 2017, starting from the Mid-term year and ending in the Post election year.

Chart 1



Dow Industrials Four-Year Presidential Cycle

In a conventional market analysis, returns are measured on an annual basis (over a *calendar* year, January through December). In this study, we first analyze returns over the "July through June" period (12 months), with a market performance horizon from *July* of the Mid-term election year through *June* of the subsequent Mid-term election year (48 months). As indicated in Chart 1, market "weakness" has typically occurred from roughly May through October of the Mid-term (2nd) Presidential year.

Table 1 below shows that over July-June periods, the weight of the evidence shows that the *highest* distribution of positive returns (S&P 500 index) of the four year Presidential term have commenced within the **2nd** year of the Presidential term (see also Table 1 Appendix), making it the most *predictable* period towards producing positive outcomes of the four, while having produced *double digit* positive returns 72% of the time.

2nd Preside	ential Term Yr
July - Jur	ne returns
1934	9.6%
1938	-1.9%
1942	10.8%
1946	-13.3%
1950	28.0%
1954	46.9%
1958	33.6%
1962	31.2%
1966	10.7%
1970	41.9%
1974	16.1%
1978	13.6%
1982	61.0%
1986	25.1%
1990	7.4%
1994	26.1%
1998	22.8%
2002	0.3%
2006	20.6%
2010	30.7%
2014	7.4%
2018	10.4%
Avg	20.0%

Next, Table 2 displays total returns produced by both the S&P 500 and Large cap "value" stock universe over the 48 month period commencing July of the Mid-term year through June of the subsequent Mid-term year from 1934 - 2022.

July 1 of 2nd	Pres year -					
June 30 of next 2nd Pres year						
(48 months)						
	S&P500	Large value				
1934 - 1938	44.2%	26.4%				
1938 - 1942	-8.5%	-2.0%				
1942 - 1946	170.5%	234.0%				
1946 - 1950	22.8%	15.1%				
1950 - 1954	112.4%	113.6%				
1954 - 1958	82.3%	77.6%				
1958 - 1962	37.8%	42.9%				
1962 - 1966	75.9%	88.0%				
1966 - 1970	-2.0%	5.1%				
1970 - 1974	34.6%	37.5%				
1974 - 1978	33.2%	68.6%				
1978 - 1982	42.0%	60.7%				
1982 - 1986	173.7%	181.0%				
1986 - 1990	63.4%	56.5%				
1990 - 1994	40.4%	55.3%				
1994 - 1998	178.5%	147.5%				
1998 - 2002	-8.0%	-2.5%				
2002 - 2006	37.9%	51.6%				
2006 - 2010	-11.5%	-16.6%				
2010 - 2014	107.4%	100.0%				
2014 - 2018	50.6%	41.0%				
2018 - 2022	50.1%	47.3%				
	avg 60.8%	65.8%				

Logically, because this period commences within the Presidential term year that has produced the highest distribution of positive 12 month returns, it has produced the highest distribution of positive 48 month returns of all of the four years.

Returns Produced after the Advent of a "Market Correction"

Over the historical sample, the market has produced a variety of price declines (or corrections) in the "1st half" (January - June) of the Mid-term cycle year - this as a function of the July - June period commencing in the 1st Presidential year having produced the most *losses* in the 12 month period (see Table 1 in Appendix). Testing shows that when a greater than > minus -10.0% decline / market correction (as measured by the S&P 500 index) has occurred in the *1st half* of the Mid-term Presidential cycle year, then subsequent (total) returns starting from July 1 through June of the *next* Mid-term Presidential year (48 months) have averaged +78.1 % for the S&P 500 and +94.8% for the Large value stock universe. Therefore, the evidence suggests that a period of price weakness that has occurred in Mid-term Presidential years has been predictive of *higher than average* forward return outcomes (Table 3 below).

July 1 of Mid-term Pres year -June 30 of next Mid-term Pres year (48 month return)

Correction of greater than - 10.0% occurs in 1st half of Midterm Pres term year

	S&P500	Large value
1938 - 1942	-8.5%	-2.0%
1942 - 1946	170.5%	234.0%
1962 - 1966	75.9%	88.0%
1970 - 1974	34.6%	37.5%
1974 - 1978	33.2%	68.6%
1982 - 1986	173.7%	181.0%
2002 - 2006	37.9%	51.6%
2010 - 2014	107.4%	100.0%
Avg	78.1%	94.8%

See Exhibits A - H in Appendix for further illustration

Looking at the performance of "Small" cap value stocks over the same periods, the Small value index produced the *best* average returns of the asset classes examined, with a 100% success of forward positive returns being produced. Table 4

Ju	y 1 of Mid	-term Pres year	r -					
June	30 of nex	t Mid-term Pre	s year					
(4	8 month r	eturn)						
Correc	ction of grea	ter than - 10.0% or	curs					
in 1:	st half of Mic	lterm Pres term ye	ar					
	S&P500	Large value	Small value					
1938 - 1942	-8.5%	-2.0%	10.0%					
1942 - 1946	170.5%	234.0%	540.0%					
1962 - 1966	75.9%	88.0%	151.0%					
1970 - 1974	34.6%	37.5%	17.5%					
1974 - 1978	974 - 1978 33.2% 68.6% 181.0%							
1982 - 1986	173.7%	181.0%	181.0%					
2002 - 2006	37.9%	51.6%	57.4%					
2010 - 2014 107.4% 100.0% 111.0%								
Avg	78.1%	94.8%	156.1%					

Table 5 displays the returns of S&P 500, Large value stocks, and Small value stocks over 48 month periods, starting in July of the Mid-term year, when the *correction* was *absent* in the 1st half (all other periods 1934 - 2018). We can see the definitive performance advantage gained when a greater than minus -10% correction occurred.

July 1 of Mid-term Pres year -
June 30 of next Mid-term Pres year
(48 month return)
NO correction in 1st half of Mid-term yea

	S&P500	Large value	Small value
1934-1938	44.2%	26.5%	34.8%
1946-1950	22.8%	15.2%	-2.1%
1950-1954	112.1%	113.3%	96.3%
1954-1958	82.3%	77.7%	76.4%
1958-1962	37.8%	42.8%	46.0%
1966-1970	-2.0%	5.1%	14.6%
1978-1982	42.0%	60.7%	93.0%
1986-1990	63.4%	56.8%	32.5%
1990-1994	40.4%	55.4%	80.9%
1994-1998	178.5%	147.0%	136.2%
1998-2002	-8.0%	-2.5%	37.6%
2006-2010	-11.5%	-16.7%	-10.1%
2014-2018	50.6%	41.0%	39.2%
2018-2022	48.6%	40.3%	19.2%
Avg	50.1%	47.3%	49.6%

Twenty Year Returns Produced After Greater than > -10% & - 20% Decline in the *Calendar* Year

Research shows that the *holding length* of stocks (time compounding) plays a key role towards investing success. Stocks held over twenty year periods have shown a 100% success rate in producing positive outcomes (2). (Chart 2)

Chart 2



Stocks become "safer" over time

Shifting to a *calendar* year basis, Mid-term Presidential years that have produced a greater than -10% intra-year decline (at some point over the *entire* calendar Mid-term year), have led to twenty year periods (*starting* January of the *3rd* Presidential term year) that have produced *higher than average* annualized compounded returns, versus all periods, since 1934 (Table 6).

Mid-term year	intra-year	50/50 portfolio	S&P500	Market bottom month
a de la como en encomo	correction	(annualized)	(annualized)	Mid-term year
		((4	or beyond
1934	-12.5%	16.3%	13.1%	Mar-35
1938	-18.6%	16.7%	13.0%	Apr-42
1942	-11.2%	19.2%	15.3%	April
1946	-10.5%	14.3%	13.7%	Oct
1962	-22.3%	14.3%	8.3%	June
1966	-15.1%	15.6%	10.2%	Sept
1970	-19.3%	14.6%	10.2%	June
1974	-32.5%	17.3%	12.5%	Sept
1982	-9.8%	14.1%	12.5%	July
1990	-14.7%	11.2%	10.6%	Oct
2002	-28.3%	10.6%	10.0%	Sept
2010	-12.8%	12.0%	12.4%	June
2018	-13.2%			Dec
2022	-20.0%			
Ave	5	14.7%	11.8%	
Avg all periods	s	13.8%	11.2%	
	Stockmark	etmap.com		

Forward 20 year returns on 50/50 Small & Large "value" portfolio starting January after S&P500 correction of greater than minus -10% occurred in Mid-term election year

In reference to Chart 1, the above data shows that the market has typically made a *low point* during various months of the Mid-term Presidential cycle year (rightmost column).

Greater than **-20%** declines that have occurred at some point during, or in years leading into the Mid-term year, have led to twenty year periods (*starting* January of the *3rd* Presidential term year) that have produced *higher than average* annualized compounded returns, versus all periods, since 1934 (Table 7). Exhibit A in Appendix

shows a composite of all 20 year growth periods shown in Table 7. In every case, the portfolio value made *all time highs* by the end of the 20 year period, whether the previous high point being exceeded was the year 1929, 1968, or 2001.

Table 7

Forwa after a	ard 20 year retur starting Janua correction of gre	ns on 50/50 Sm ary of 3rd President ater than -20%	nall & Large "va dential term ye 6 occurred in M	ilue" portfolio ear lid-term election year
Mid-term year	"Peak" into midterm year correction "low" decline	50/50 portfolio (annualized)	S&P500 annualized)	Market bottom month Mid-term yr or beyond
1934	-20.0%	16.3%	13.1%	Mar-35
1938	-50.0%	16.7%	13.0%	Apr-42
1946	-21.0%	14.3%	13.7%	Oct
1962	-22.3%	14.3%	8.3%	June
1970	-28.0%	14.6%	10.2%	June
1974	-32.5%	17.3%	12.5%	Sept
2002	-44.8%	10.6%	11.4%	Sept
2022	-24.0%			
Avg		14.9%	11.7%	
Avg all perio	ods	13.8%	11.2%	
stockmarke	tmap.com	corrections mea	sured on monthly	close basis

These rare events have beneficial implications for investors who are considering entering the *income* stage of the investment lifecycle (retirement) and who may thus be starting the *income withdrawal sequence* at the end of a calendar year, such as at the end of the Pre-election or Election years. Entering this stage during periods of *market weakness* will likely produce better outcomes of income withdrawal over the twenty year period, and higher than average portfolio growth by the end of the twenty

year period (3). However, behaviorally, market declines of this type can create *loss aversion* within the minds of investors - a willingness to *sell out* of equity assets during the very timeframe of lowest forward market risk, statistically.

There is strong reason to believe that these phenomena will *most likely* continue into the foreseeable future, as the long term growth of the market has to do with good policy, open trade, property rights, incentives towards rewarding shareholders, and high level of innovation. In addition to stable government and monetary policy, an increased willingness of policymakers to intervene on behalf of the markets and "step in", in order to prevent financial dislocations from happening, creates support and confidence that was otherwise lacking in past eras.

Figure 1 shows key events relating to the declines occurring in Mid-term Presidential cycle years . (see also "WWII events timeline" in Appendix)

Figure 1

Midterm Year	Event
1934	(Roosevelt fiscal packages put in place)
1938	
1942	(Battle and victory of Midway)
1946	
1962	(Cuban Missile Crisis)
1966	
1970	(Recession)
1974	(Nadir of 1974 recession on start of inflationary period)
1990	(Iraq War 1)
2002	(Post 911 economic slowdown)
2010	(Post 2008 Financial Crisis and passge of Dodd–Frank Wall Street Reform and Consumer Protection Act)
2018	
2022	(Russian Ukraine conflict)

Conclusion

With a key to investment success being *the holding of equity based assets for long(est) optimal periods (time in the market)* in order to allow for the compounding of earnings growth and dividends, this evidence provides reassurance to an investor who may be concerned by the occurrence of market volatility during these specific time frames, and who may be tempted into *selling out of* equity assets in an emotional and knee jerk manner. It suggests that mid-term years within the four year Presidential cycle have presented opportunitles of *low*, forward equity market risk.

Appendix

Exhibit A

1st Presidential Term 2nd Presidential Term Year		3rd Presidential Term Year		4th Presidential Term Year			
July - June return July - June returns		ne returns	July - June return		July - June return		
-		-					
Jul-33	-6.1%	1934	9.6%	1935	51.5%	1936	8.5%
Jul-37	-20.0%	1938	-1.9%	1939	-2.7%	1940	5.7%
Jul-41	-9.3%	1942	10.8%	1943	10.8%	1944	20.9%
Jul-45	28.1%	1946	-13.3%	1947	16.3%	1948	-9.5%
Jul-49	34.4%	1950	28.0%	1951	2.3%	1952	2.3%
Jul-53	28.0%	1954	46.9%	1955	19.1%	1956	4.7%
Jul-57	-0.6%	1958	33.6%	1959	0.6%	1960	17.3%
Jul-61	-12.6%	1962	31.2%	1963	21.5%	1964	6.2%
Jul-65	4.0%	1966	10.7%	1967	13.4%	1968	1.2%
Jul-69	-22.8%	1970	41.9%	1971	10.7%	1972	0.2%
Jul-73	-14.5%	1974	16.1%	1975	14.0%	1976	0.5%
Jul-77	0.1%	1978	13.6%	1979	17.2%	1980	20.5%
Jul-81	-11.4%	1982	61.0%	1983	-4.6%	1984	31.2%
Jul-85	33.3%	1986	25.1%	1987	-6.9%	1988	20.5%
Jul-89	16.2%	1990	7.4%	1991	13.4%	1992	13.6%
Jul-93	1.2%	1994	26.1%	1995	26.0%	1996	34.7%
Jul-97	30.0%	1998	22.8%	1999	7.2%	2000	-14.8%
Jul-01	-18.0%	2002	0.3%	2003	19.1%	2004	6.3%
Jul-05	8.4%	2006	20.6%	2007	-13.1%	2008	-26.2%
Jul-09	14.3%	2010	30.7%	2011	5.4%	2012	20.6%
Jul-13	24.4%	2014	7.4%	2015	4.0%	2016	17.9%
Jul-17	14.1%	2018	10.4%	2019	7.5%	2020	40.0%
Jul-21	-10.6%						
Avg	5.5%	Avg	20.0%	Avg	10.6%	Avg	10.1%
		Years in red	= S&P price < movi	ng avg June 3	Oth		

Exhibit B shows a graphical depiction of the growth of a 50/50 Small and Large cap value portfolio over subsequent twenty year periods after the occurrence of a greater than minus -20% corrections in / into mid-term Presidential election cycle years as referenced in Table 7

Exhibit B



Mid-term year 1942 WWII events timeline



References

(1) "The Presidential Term: Is the Third Year the Charm?" Beyer, Jenson and Johnson

"Mid-Term Election Handbook" March 2018 Ned Davis Research

(2) "Stocks For The Long Run" pg 94 2014 Seigel, Jeremy Wharton School "Stocks become "safer" over time" Scott Cederburg University of Arizona

(3) "A Study of Income Withdrawal Sustainability using Large Value and Small Value Stocks" <u>https://tinyurl.com/yckmev96</u>

Performance calculations conducted using Portfoliovisualizer.com "Backtest Portfolio Asset Allocation" module and IFA.com index calculator (ie. Ken French database)

Related research <u>The Moving Average Process: A Tactical Method Towards Adjusting</u> <u>Portfolio Risk</u>

Stockmarketmap.com

https://tinyurl.com/4kjzczcr

Disclaimer: It may be important to note that there are no guarantees in any investment and past returns may not be reflective of future returns. Information contained herein or mention of any investment product or portfolio in this paper is not meant to be construed as investment advice or product sale. The author has no relationship with any of the vendors mentioned.

Table 6 shows forward total and annualized returns for Large value stocks extended out over a *longer* period (96+ months) from the occurrence of a greater than > minus - 10% decline / market correction occurring in the 1st half of a midterm year.

	Correctio occurs in 1	n of greater tha .st Half of Midte	n - 10.0% erm Pres term y	year		
Month of	Return into	July of next				
> -10.0% correction	n Midterm Pres year 96+ month					
	(48+ month	ns)			total return	
	S&P 500	Large Value	Small Value	Nasdaq 100	Large Value	Annualized
Mar-38	26.7%	35.0%	45.9%		351.0%	20.0%
Apr-42	198.5%	250.7%	434.0%		303.9%	18.6%
May-62	61.8%	74.4%	115.7%		83.4%	7.8%
May-70	28.1%	28.7%	10.2%		114.0%	9.0%
Jun-74	33.2%	106.7%	181.0%		171.0%	13.2%
Mar-82	166.0%	177.0%	263.0%		334.0%	19.5%
Jun-02	37.9%	51.5%	57.5%	50.7%	26.3%	3.0%
Jun-10	107.1%	99.0%	111.0%	130.4%	182.0%	13.8%
Feb-22						
avg	82.4%	102.9%	152.3 %	90.6%	195.7%	13.1%

The 100% success of forward 48 month positive return outcomes shown in the previous tables is due to the returns produced over the periods starting in the July - June period of the 1st, or Post, election Presidential term year - those periods having been the most volatile and having produced the highest number of negative returns of the four Presidential term years (see Table 1 Appendix). Since equity markets have risen in 80% of all July - June periods since 1933, the advent of price weakness inevitably increases odds of higher prices *down the line*.

Even reviewing greater than minus -10% declines that have occurred over *entire* Mid-term years shows that, starting from January of the **3rd** Presidential term year, Large & Small value stocks have produced decent forward eight year returns (Table 8). Relating to the graphic in Chart 1, this pulls in years when

market weakness occurred in the "2nd half" of the Mid-term year (1934, 1946, 1966, 1990, and 2018).

> minus -10% Declines Occurring in Mid-term Years Forward 8 Year Returns							
Month	Worst Decline	8 year period	Large Value	Small Value			
Jul-34	-12.3%	1935 - 1942	73.1%	86.5%			
Mar-38	-18.6%	1939 - 1946	146.0%	366.0%			
Apr-42	-10.6%		311.0%	698.0%			
Nov-46	-11.8%		286.0%	248.0%			
Jun-62	-22.7%		124.6%	258.0%			
Sep-66	-15.2%		31.5%	6.7%			
Jun-70	-19.5%		120.8%	142.0%			
Sep-74	-34.2%		352.0%	800.0%			
Oct-90	-14.7%		308.0%	362.0%			
Sep-02	-28.3%		89.7%	120.0%			
Jun-10	-12.8%	2011 - 2018	120.0%	98.0%			
Dec-18	-13.5%						
May 22 ?	- 17.0% ?						
		avg	178.4%	289.6%			

Correction of greater than - 10.0%	
occurs in 1st Half of 2nd Pres term	/ear

Month of	Return into July
> -10.0% correction	of next 2nd Pres
	term year
	S&P 500
Mar-38	26.7%
Apr-42	198.5%
May-62	61.8%
May-70	28.1%
Jun-74	33.2%
Jun-02	37.9%
Jun-10	107.1%
avg	70.5%

Stockmarketmap is an investment research project whose aim is to determine the most "optimal" equity investment portfolio for each stage of an investor's investment "lifecycle".

Correction occurs in 1	of grea Ist Half	iter thai of 2nd I	n - 5.0% Pres term year	
Month of	Re	turn int	to July of	
> -5.0% correc	tion ne	ext 2nd	Pres term year	
	S	&P500	Large "Value"	Nasdaq 100
Mar-34	1	36.6%	17.5%	
Mar-38		26.7%	35.0%	
Mar-42	1	86.5%	238.3%	
Feb-46		32.5%	28.0%	
Apr-62		48.6%	65.3%	
May-66		-3.1%	5.0%	
Jan-70	1	17.1%	24.7%	
Apr-74	4	27.9%	58.5%	
Jan-78	!	55.8%	74.8%	
Feb-82	1	70.4%	182.0%	
Jan-90	;	55.1%	64.4%	78.4%
Mar-94	1	79.8%	149.0%	249.0%
Apr-02	1	27.2%	42.6%	24.0%
May-10		96.3%	89.7%	117.0%
Mar-18				
Jan-22				
	avg	68.4%	<mark>76.8%</mark>	117.10%

Exhibit A



Exhibit B



Exhibit C



Exhibit D



Exhibit E



Exhibit F



Exhibit G



Exhibit H

