

**Morning Email: TERM TEDS & Dirty TEDS**

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Rotate Me

F.I. Futures and Cash			
	Last Decimal	Last 32	Last Yield*
ZT	101.8438	101.270	4.898
ZF	104.7969	104.255	4.753
ZN	107.1875	107.060	4.743
Blank			
2y	99.719	99.2300	4.899
5y	99.406	99.1300	4.757
10y	98.984	98.3150	4.755

\*Futures use CTD for Last Yield

\*\*Mduration = Modified Macaulay Duration

Eurodollars (ED)						
	Last Price	Last Imp Yield	Days til Expr.	Fraction of year	Month	
F.EDAH07	94.640	5.360	55	0.150	MAR	White Pack
F.EDAM07	94.675	5.325	146	0.399	JUN	
F.EDAU07	94.785	5.215	237	0.649	SEP	
F.EDAZ07	94.905	5.095	328	0.898	DEC	
F.EDAH08	94.990	5.010	419	1.147	MAR	Red Pack
F.EDAM08	95.035	4.965	510	1.397	JUN	
F.EDAU08	95.065	4.935	601	1.646	SEP	
F.EDAZ08	95.070	4.930	692	1.895	DEC	Green Pack
F.EDAH09	95.080	4.920	783	2.145	MAR	
F.EDAM09	95.070	4.930	874	2.394	JUN	
F.EDAU09	95.050	4.950	965	2.643	SEP	
F.EDAZ09	95.010	4.990	1056	2.893	DEC	

**How many ways can you hedge the TED? Let me count...there's lots and lots, like:**

- 1 Regression
- 2 Engineered
- 3 Strip with and without Stubs
- 4 Convexity Bias
- 5 Weighted
- 6 Unweighted  
and more...

Most of us are interested in the *unweighted hedge* which is simply a curve trade hedge. There are so many ways to hedge the TED trade that I can't possibly list them all.

If you email me and ask for a specific hedge, I'll get it to you.

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#### **Eurodollar Color Codes for Individual Year Strips:**

<b>Color</b>	<b>Year</b>	<b>Contracts</b>
White	One	1 – 4
Red	Two	5 – 8
Green	Three	9 – 12
Blue	Four	13 – 16
Gold	Five	17 – 20
Purple	Six	21 – 24
Orange	Seven	25 – 28
Pink	Eight	29 – 32
Silver	Nine	33 – 36
Copper	Ten	37 – 40

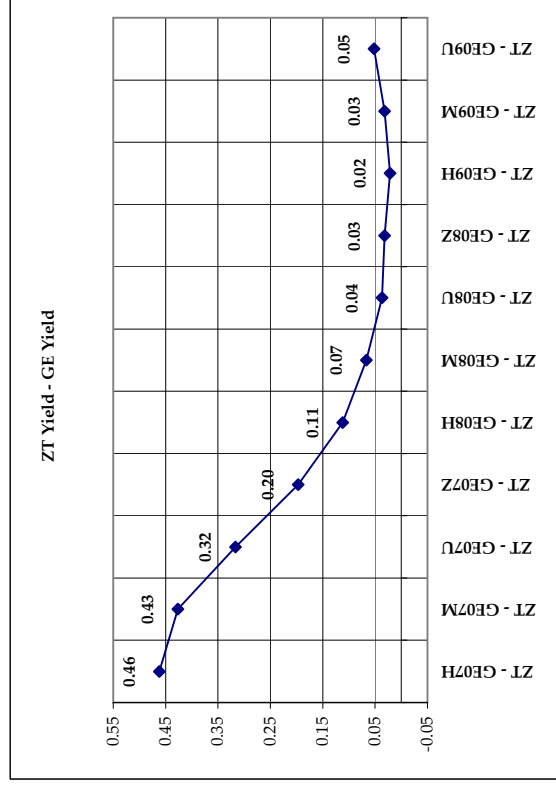
Dirty TED: ZT vs Eurodollar Contracts

ZT

	Spread Price	Spread Yield	Spread Name
F.EDAH07	7.204	0.46	ZT - GE07H
F.EDAM07	7.169	0.43	ZT - GE07M
F.EDAU07	7.059	0.32	ZT - GE07U
F.EDAZ07	6.939	0.20	ZT - GE07Z
F.EDAH08	6.854	0.11	ZT - GE08H
F.EDAM08	6.809	0.07	ZT - GE08M
F.EDAU08	6.779	0.04	ZT - GE08U
F.EDAZ08	6.774	0.03	ZT - GE08Z
F.EDAH09	6.764	0.02	ZT - GE09H
F.EDAM09	6.774	0.03	ZT - GE09M
F.EDAU09	6.794	0.05	ZT - GE09U
F.EDAZ09	6.834	0.09	ZT - GE09Z

Price = Outright Decimal Price - Euro Contract Price

Yield = ABS(Proxy Yield - Implied Euro Contract yield)



GE Duration as Fraction of year

	Duration	ZT Duration	Spread Duration
F.EDAH07	0.150	1.82	1.67
F.EDAM07	0.399	1.82	1.42
F.EDAU07	0.649	1.82	1.17
F.EDAZ07	0.898	1.82	0.92
F.EDAH08	1.147	1.82	0.67
F.EDAM08	1.397	1.82	0.42
F.EDAU08	1.646	1.82	0.17
F.EDAZ08	1.895	1.82	(0.07)
F.EDAH09	2.145	1.82	(0.32)
F.EDAM09	2.394	1.82	(0.57)
F.EDAU09	2.643	1.82	(0.82)
F.EDAZ09	2.893	1.82	(1.07)

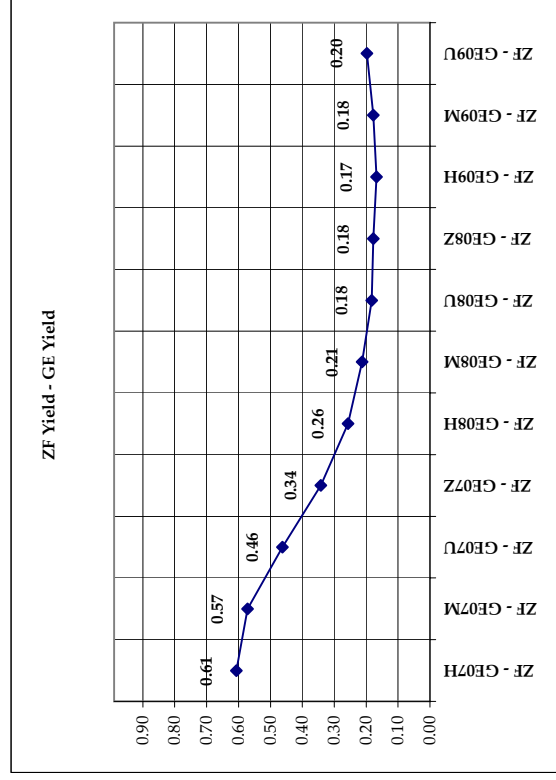
The farther away from 0 the spread duration is the riskier the trade.

**Dirty TED: ZF vs Eurodollar Contracts**

	ZF	
	Spread Price	Spread Yield
	Price	Name
F.EDAH07	10.16	ZF - GE07H
F.EDAM07	10.12	ZF - GE07M
F.EDAU07	10.01	ZF - GE07U
F.EDAZ07	9.89	ZF - GE07Z
F.EDAH08	9.81	ZF - GE08H
F.EDAM08	9.76	ZF - GE08M
F.EDAU08	9.73	ZF - GE08U
F.EDAZ08	9.73	ZF - GE08Z
F.EDAH09	9.72	ZF - GE09H
F.EDAM09	9.73	ZF - GE09M
F.EDAU09	9.75	ZF - GE09U
F.EDAZ09	9.79	ZF - GE09U

Price = Outright Decimal Price - Euro Contract Price

Yield = ABS(Proxy Yield - Implied Euro Contract yield)



GE Duration as Fraction of year	ZF	
	Duration	Spread Duration
F.EDAH07	0.150	3.70
F.EDAM07	0.399	3.45
F.EDAU07	0.649	3.20
F.EDAZ07	0.898	2.96
F.EDAH08	1.147	2.71
F.EDAM08	1.397	2.46
F.EDAU08	1.646	2.21
F.EDAZ08	1.895	1.96
F.EDAH09	2.145	1.71
F.EDAM09	2.394	1.46
F.EDAU09	2.643	1.21
F.EDAZ09	2.893	0.96

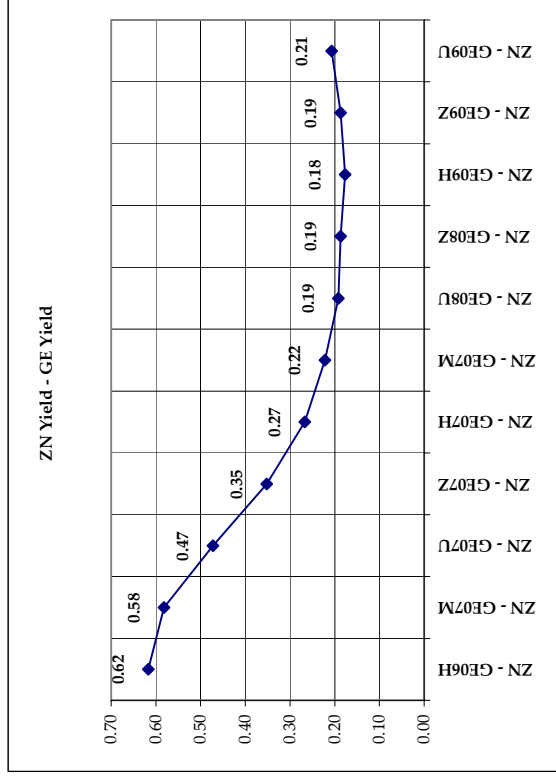
The farther away from 0 the spread duration is the riskier the trade.

Dirty TED: ZN vs Eurodollar Contracts

	Spread Price	ZN Spread Yield	Spread Name
F.EDAH07	12.55	0.62	ZN - GE06H
F.EDAM07	12.51	0.58	ZN - GE07M
F.EDAU07	12.40	0.47	ZN - GE07U
F.EDAZ07	12.28	0.35	ZN - GE07Z
F.EDAH08	12.20	0.27	ZN - GE07H
F.EDAM08	12.15	0.22	ZN - GE07M
F.EDAU08	12.12	0.19	ZN - GE08U
F.EDAZ08	12.12	0.19	ZN - GE08Z
F.EDAH09	12.11	0.18	ZN - GE09H
F.EDAM09	12.12	0.19	ZN - GE09M
F.EDAU09	12.14	0.21	ZN - GE09U
F.EDAZ09	12.18	0.25	ZN - GE09Z

Price = Outright Decimal Price - Euro Contract Price

Yield = ABS(Proxy Yield - Implied Euro Contract yield)



GE Duration as Fraction of year	ZN Duration	Spread Duration
F.EDAH07	0.150	5.63
F.EDAM07	0.399	5.38
F.EDAU07	0.649	5.13
F.EDAZ07	0.898	4.88
F.EDAH08	1.147	4.63
F.EDAM08	1.397	4.38
F.EDAU08	1.646	4.14
F.EDAZ08	1.895	3.89
F.EDAH09	2.145	3.64
F.EDAM09	2.394	3.39
F.EDAU09	2.643	3.14
F.EDAZ09	2.893	2.89

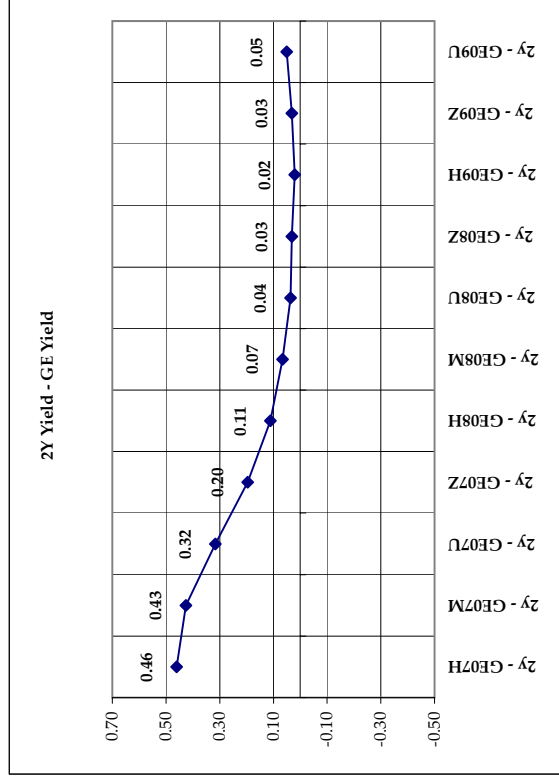
The farther away from 0 the spread duration is the riskier the trade.

TERM TED: 2y vs Eurodollar Contracts

	Spread Price	2y Spread Yield	Spread Name
F.EDAH07	5.08	0.46	2y - GE07H
F.EDAM07	5.04	0.43	2y - GE07M
F.EDAU07	4.93	0.32	2y - GE07U
F.EDAZ07	4.81	0.20	2y - GE07Z
F.EDAH08	4.73	0.11	2y - GE08H
F.EDAM08	4.68	0.07	2y - GE08M
F.EDAU08	4.65	0.04	2y - GE08U
F.EDAZ08	4.65	0.03	2y - GE08Z
F.EDAH09	4.64	0.02	2y - GE09H
F.EDAM09	4.65	0.03	2y - GE09Z
F.EDAU09	4.67	0.05	2y - GE09U
F.EDAZ09	4.71	0.09	2y - GE09U

Price = Outright Decimal Price - Euro Contract Price

Yield = ABS(Cash Yield - Implied Euro Contract yield)



GE Duration as Fraction of year	2Y Duration	Spread Duration
F.EDAH07	0.150	1.67
F.EDAM07	0.399	1.42
F.EDAU07	0.649	1.17
F.EDAZ07	0.898	0.92
F.EDAH08	1.147	0.67
F.EDAM08	1.397	0.42
F.EDAU08	1.646	0.17
F.EDAZ08	1.895	(0.07)
F.EDAH09	2.145	(0.32)
F.EDAM09	2.394	(0.57)
F.EDAU09	2.643	(0.82)
F.EDAZ09	2.893	(1.07)

The farther away from 0 the spread duration is the riskier the trade.

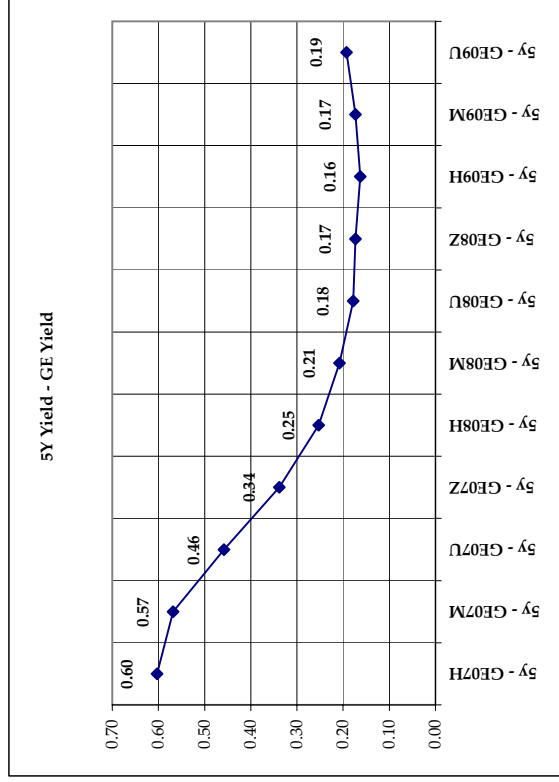
**TERM TED: 5y vs Eurodollar Contracts**

**5y**

	Spread Price	Spread Yield	Spread Name
F.EDAH07	4.77	0.60	5y - GE07H
F.EDAM07	4.73	0.57	5y - GE07M
F.EDAU07	4.62	0.46	5y - GE07U
F.EDAZ07	4.50	0.34	5y - GE07Z
F.EDAH08	4.42	0.25	5y - GE08H
F.EDAM08	4.37	0.21	5y - GE08M
F.EDAU08	4.34	0.18	5y - GE08U
F.EDAZ08	4.34	0.17	5y - GE08Z
F.EDAH09	4.33	0.16	5y - GE09H
F.EDAM09	4.34	0.17	5y - GE09M
F.EDAU09	4.36	0.19	5y - GE09U
F.EDAZ09	4.40	0.23	5y - GE09Z

Price = Outright Decimal Price - Euro Contract Price

Yield = ABS(Cash Yield - Implied Euro Contract yield)



**GE Duration as Fraction of year**

	Duration	5Y Duration	Spread Duration
F.EDAH07	0.150	4.35	4.20
F.EDAM07	0.399	4.35	3.95
F.EDAU07	0.649	4.35	3.70
F.EDAZ07	0.898	4.35	3.45
F.EDAH08	1.147	4.35	3.20
F.EDAM08	1.397	4.35	2.95
F.EDAU08	1.646	4.35	2.70
F.EDAZ08	1.895	4.35	2.45
F.EDAH09	2.145	4.35	2.20
F.EDAM09	2.394	4.35	1.96
F.EDAU09	2.643	4.35	1.71
F.EDAZ09	2.893	4.35	1.46

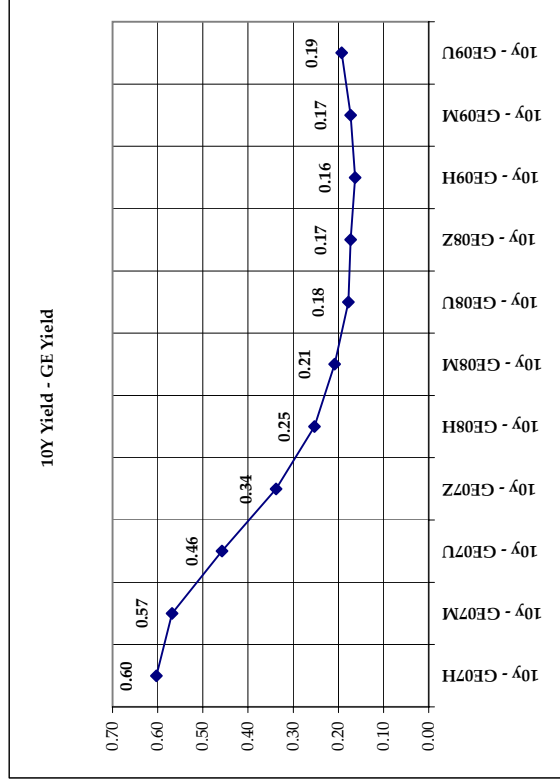
The farther away from 0 the spread duration is the riskier the trade.

**TERM TED: 10y vs Eurodollar Contracts**

		10y	
Spread	Spread	Spread	Spread
Price	Yield	Yield	Name
F.EDAH07	4.77	0.60	10y - GE07H
F.EDAM07	4.73	0.57	10y - GE07M
F.EDAU07	4.62	0.46	10y - GE07U
F.EDAZ07	4.50	0.34	10y - GE07Z
F.EDAH08	4.42	0.25	10y - GE08H
F.EDAM08	4.37	0.21	10y - GE08M
F.EDAU08	4.34	0.18	10y - GE08U
F.EDAZ08	4.34	0.17	10y - GE08Z
F.EDAH09	4.33	0.16	10y - GE09H
F.EDAM09	4.34	0.17	10y - GE09M
F.EDAU09	4.36	0.19	10y - GE09U
F.EDAZ09	4.40	0.23	10y - GE09Z

Price = Outright Decimal Price - Euro Contract Price

Yield = ABS(Cash Yield - Implied Euro Contract yield)



GE Duration as		10Y		Spread	
Fraction	Duration	Duration	Duration	Duration	Duration
of year	of year	of year	of year	of year	of year
F.EDAH07	0.150	7.73	7.58	10y - GE07H	7.58
F.EDAM07	0.399	7.73	7.33	10y - GE07M	7.33
F.EDAU07	0.649	7.73	7.08	10y - GE07U	7.08
F.EDAZ07	0.898	7.73	6.83	10y - GE07Z	6.83
F.EDAH08	1.147	7.73	6.58	10y - GE08H	6.58
F.EDAM08	1.397	7.73	6.33	10y - GE08M	6.33
F.EDAU08	1.646	7.73	6.08	10y - GE08U	6.08
F.EDAZ08	1.895	7.73	5.83	10y - GE08Z	5.83
F.EDAH09	2.145	7.73	5.58	10y - GE09H	5.58
F.EDAM09	2.394	7.73	5.34	10y - GE09M	5.34
F.EDAU09	2.643	7.73	5.09	10y - GE09U	5.09
F.EDAZ09	2.893	7.73	4.84	10y - GE09Z	4.84

The farther away from 0 the spread duration is the riskier the trade.