

Morning Email: TERM TEDS & Dirty TEDS

Table of Contents

Pg1	Overview and hedges
Pg2	Dirty TED: ZT vs Eurodollar Contracts
Pg3	Dirty TED: ZF vs Eurodollar Contracts
Pg4	Dirty TED: ZN vs Eurodollar Contracts
Pg5	TERM TED: 2y vs Eurodollar Contracts
Pg6	TERM TED: 5y vs Eurodollar Contracts
Pg7	TERM TED: 10y vs Eurodollar Contracts

Rotate Me

F.I. Futures and Cash			
	Last Decimal	Last 32	Last Yield*
ZT	102.3438	102.1100	4.685%
ZF	105.7188	105.2300	4.548%
ZN	108.20	108.065	4.575%
Blank			
2y	100.391	100.1250	4.659%
3y	100.813	100.2600	4.570%
5y	100.313	100.1000	4.553%
10y	101.984	101.3150	4.622%

*Futures use CTD for Last Yield

Eurodollars (GE)				
	Last Price	Last Imp Yield	Days til Expr.	Fraction of year
@GE06Z	94.695	5.305	87	0.238
@GE07H	94.855	5.145	178	0.487
@GE07M	95.030	4.970	269	0.736
@GE07U	95.190	4.810	360	0.986
@GE07Z	95.275	4.725	451	1.235
@GE08H	95.310	4.690	542	1.484
@GE08M	95.300	4.700	633	1.734
@GE08U	95.270	4.730	724	1.983
@GE08Z	95.225	4.775	815	2.232
@GE09H	95.190	4.810	906	2.482
@GE09M	95.140	4.860	997	2.731
@GE09U	95.100	4.900	1088	2.980

Whites

Reds

Greens

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:

Color	Year	Contracts
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

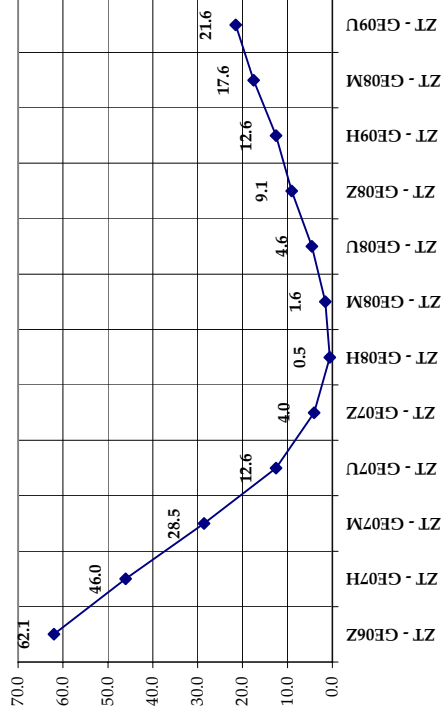
	Spread Price	Spread Yield	Spread Name
@GE06Z	7.649	62.1	ZT - GE06Z
@GE07H	7.489	46.0	ZT - GE07H
@GE07M	7.314	28.5	ZT - GE07M
@GE07U	7.154	12.6	ZT - GE07U
@GE07Z	7.069	4.0	ZT - GE07Z
@GE08H	7.034	0.5	ZT - GE08H
@GE08M	7.044	1.6	ZT - GE08M
@GE08U	7.074	4.6	ZT - GE08U
@GE08Z	7.119	9.1	ZT - GE08Z
@GE09H	7.154	12.6	ZT - GE09H
@GE09M	7.204	17.6	ZT - GE09M
@GE09U	7.244	21.6	ZT - GE09U

Last = Outright ZT Decimal Price - Euro contract Price

Last32 = Amount after decimal in Last column * 32

Yield = ABS(ZT Proxy Yield - Implied Euro contract yield)

ZT Yield - GE Yield



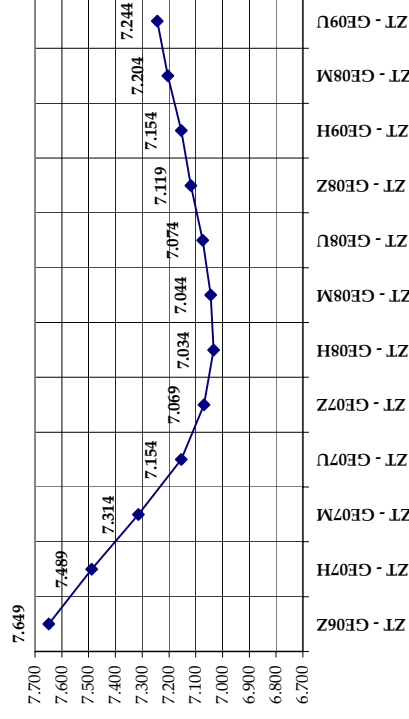
GE Duration as

GE Duration as Fraction of year	ZT Duration	Spread Duration
@GE06Z	0.238	1.88
@GE07H	0.487	1.88
@GE07M	0.736	1.88
@GE07U	0.986	1.88
@GE07Z	1.235	1.88
@GE08H	1.484	1.88
@GE08M	1.734	1.88
@GE08U	1.983	1.88
@GE08Z	2.232	1.88
@GE09H	2.482	1.88
@GE09M	2.731	1.88
@GE09U	2.980	1.88

The farther away from 0 the spread duration is

the riskier the trade.

ZT Decimal Price - GE Price



Dirty TED: ZF vs Eurodollar Contracts

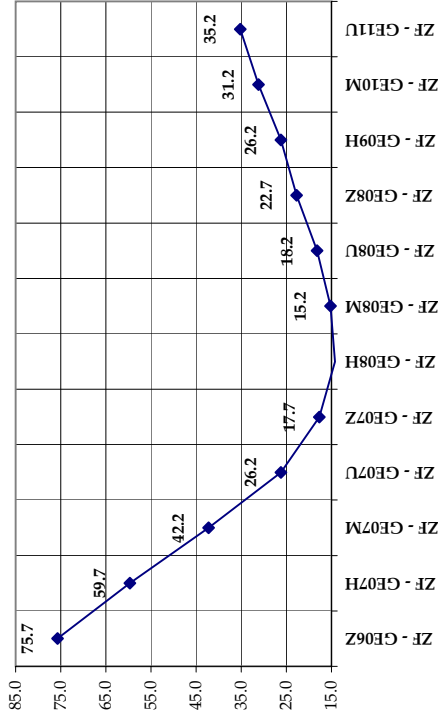
	ZF		
	Spread Price	Spread Yield	Spread Name
@GE06Z	11.02	75.7	ZF - GE06Z
@GE07H	10.86	59.7	ZF - GE07H
@GE07M	10.69	42.2	ZF - GE07M
@GE07U	10.53	26.2	ZF - GE07U
@GE07Z	10.44	17.7	ZF - GE07Z
@GE08H	10.41	14.2	ZF - GE08H
@GE08M	10.42	15.2	ZF - GE08M
@GE08U	10.45	18.2	ZF - GE08U
@GE08Z	10.49	22.7	ZF - GE08Z
@GE09H	10.53	26.2	ZF - GE09H
@GE09M	10.58	31.2	ZF - GE09M
@GE09U	10.62	35.2	ZF - GE09U

Last = Outright ZF Decimal Price - Euro contract Price

Last32 = Amount after decimal in Last column * 32

Yield = ABS(ZT Proxy Yield - Implied Euro contract yield)

ZF Yield - GF Yield

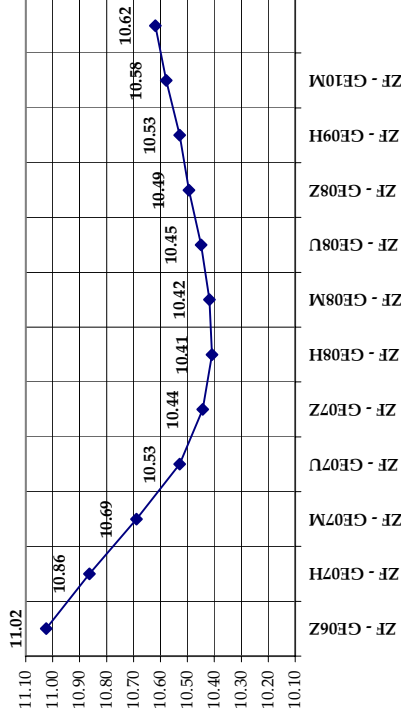


GE Duration as Fraction of year

	GE Duration as Fraction of year	ZF Duration	Spread Duration
@GE06Z	0.238	3.68	3.44
@GE07H	0.487	3.68	3.19
@GE07M	0.736	3.68	2.94
@GE07U	0.986	3.68	2.69
@GE07Z	1.235	3.68	2.44
@GE08H	1.484	3.68	2.19
@GE08M	1.734	3.68	1.94
@GE08U	1.983	3.68	1.70
@GE08Z	2.232	3.68	1.45
@GE09H	2.482	3.68	1.20
@GE09M	2.731	3.68	0.95
@GE09U	2.980	3.68	0.70

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

ZF Decimal Price - GE Price



Dirty TED: ZN vs Eurodollar Contracts

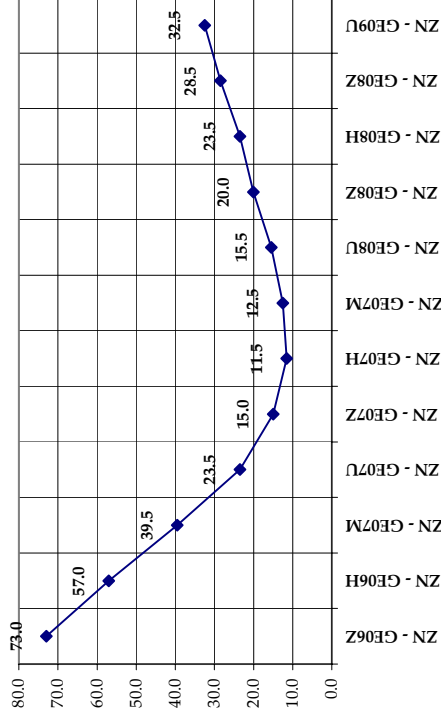
	Spread Price	ZN Yield	Spread Yield	Spread Name
@GE06Z	13.51	73.0	ZN - GE06Z	
@GE07H	13.35	57.0	ZN - GE06H	
@GE07M	13.17	39.5	ZN - GE07M	
@GE07U	13.01	23.5	ZN - GE07U	
@GE07Z	12.93	15.0	ZN - GE07Z	
@GE08H	12.89	11.5	ZN - GE07H	
@GE08M	12.90	12.5	ZN - GE07M	
@GE08U	12.93	15.5	ZN - GE08U	
@GE08Z	12.98	20.0	ZN - GE08Z	
@GE09H	13.01	23.5	ZN - GE08H	
@GE09M	13.06	28.5	ZN - GE08Z	
@GE09U	13.10	32.5	ZN - GE09U	

Last = Outright ZN Decimal Price - Euro contract Price

Last32 = Amount after decimal in Last column * 32

Yield = ABS(ZT Proxy Yield - Implied Euro contract yield)

ZN Yield - GE Yield

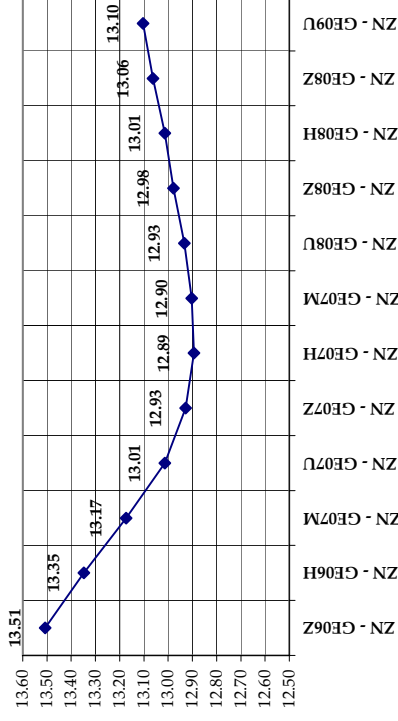


GE Duration as Fraction of year

	ZN Fraction of year	ZN Duration	Spread Duration
@GE06Z	0.238	5.73	5.49
@GE07H	0.487	5.73	5.24
@GE07M	0.736	5.73	4.99
@GE07U	0.986	5.73	4.74
@GE07Z	1.235	5.73	4.49
@GE08H	1.484	5.73	4.24
@GE08M	1.734	5.73	3.99
@GE08U	1.983	5.73	3.74
@GE08Z	2.232	5.73	3.49
@GE09H	2.482	5.73	3.24
@GE09M	2.731	5.73	2.99
@GE09U	2.980	5.73	2.74

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

ZN Decimal Price - GE Price



TERM TED: 2y vs Eurodollar Contracts

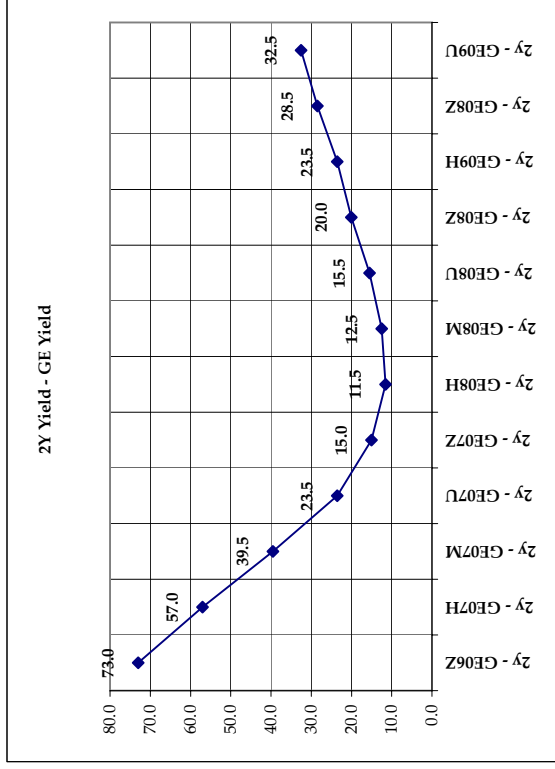
2y

Spread Price	Spread Yield	Spread Name
5.70	73.0	2y - GE06Z
5.54	57.0	2y - GE07H
5.36	39.5	2y - GE07M
5.20	23.5	2y - GE07U
5.12	15.0	2y - GE07Z
5.08	11.5	2y - GE08H
5.09	12.5	2y - GE08M
5.12	15.5	2y - GE08U
5.17	20.0	2y - GE08Z
5.20	23.5	2y - GE09H
5.25	28.5	2y - GE09M
5.29	32.5	2y - GE09U

Last = Outright 2y Decimal Price - Euro contract Price

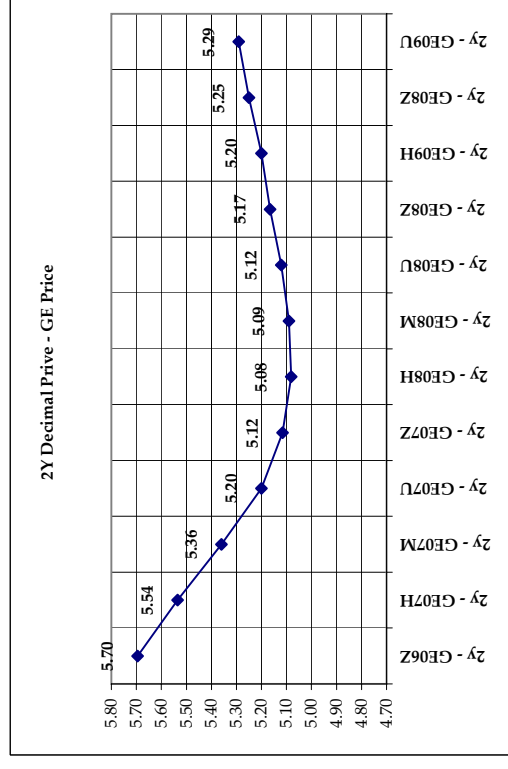
Last32 = Amount after decimal in Last column * 32

Yield = ABS(ZT Proxy Yield - Implied Euro contract yield)



GE Duration as Fraction of year	2Y Duration	Spread Duration
0.238	1.74	1.50
0.487	1.74	1.25
0.736	1.74	1.00
0.986	1.74	0.75
1.235	1.74	0.50
1.484	1.74	0.25
1.734	1.74	0.00
1.983	1.74	(0.25)
2.232	1.74	(0.50)
2.482	1.74	(0.75)
2.731	1.74	(1.00)
2.980	1.74	(1.24)

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



TERM TED: 5y vs Eurodollar Contracts

5y

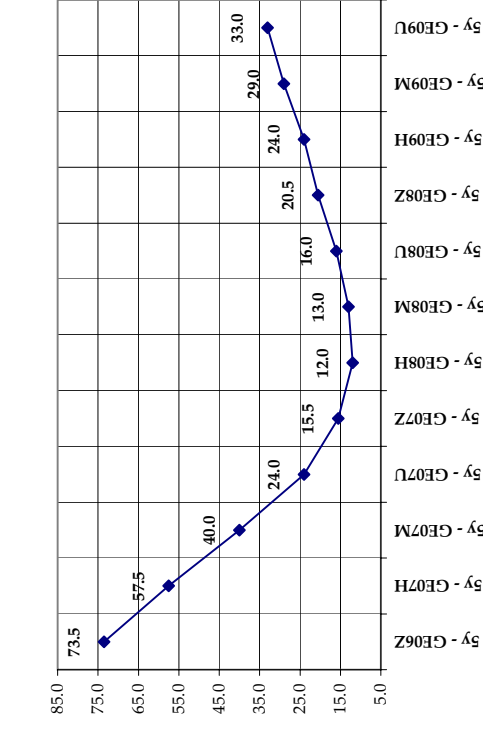
Spread Price	Spread Yield	Spread Name
@GE06Z	6.12	5y - GE06Z
@GE07H	5.96	5y - GE07H
@GE07M	5.78	5y - GE07M
@GE07U	5.62	5y - GE07U
@GE07Z	5.54	5y - GE07Z
@GE08H	5.50	5y - GE08H
@GE08M	5.51	5y - GE08M
@GE08U	5.54	5y - GE08U
@GE08Z	5.59	5y - GE08Z
@GE09H	5.62	5y - GE09H
@GE09M	5.67	5y - GE09M
@GE09U	5.71	5y - GE09U

Last = Outright 5y Decimal Price - Euro contract Price

Last32 = Amount after decimal in Last column * 32

Yield = ABS(ZT Proxy Yield - Implied Euro contract yield)

5Y Yield - GE Yield



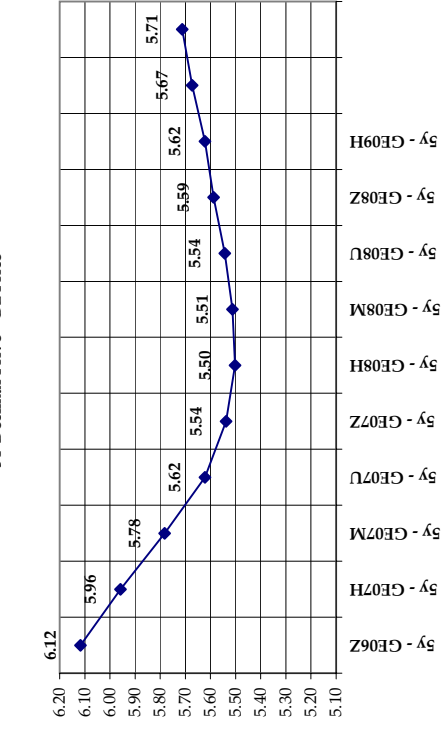
GE Duration as Fraction of year

5Y Duration

Spread Duration	5Y Duration	Spread Duration
@GE06Z	0.238	4.01
@GE07H	0.487	3.77
@GE07M	0.736	3.52
@GE07U	0.986	3.27
@GE07Z	1.235	3.02
@GE08H	1.484	2.77
@GE08M	1.734	2.52
@GE08U	1.983	2.27
@GE08Z	2.232	2.02
@GE09H	2.482	1.77
@GE09M	2.731	1.52
@GE09U	2.980	1.27

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

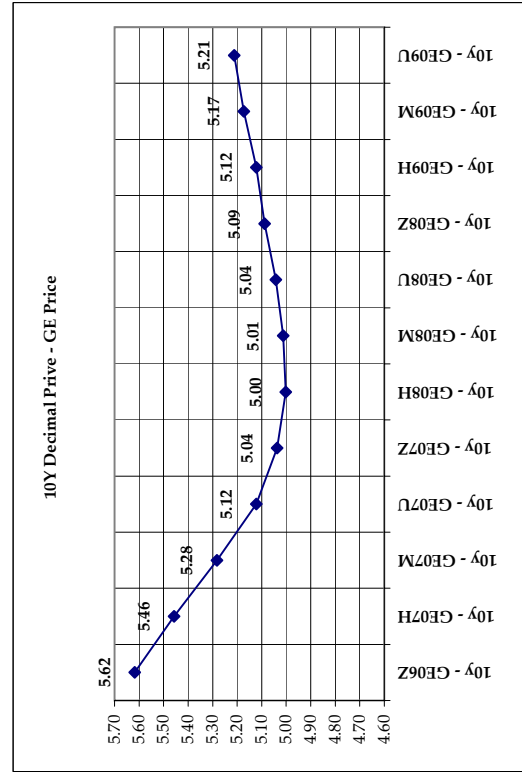
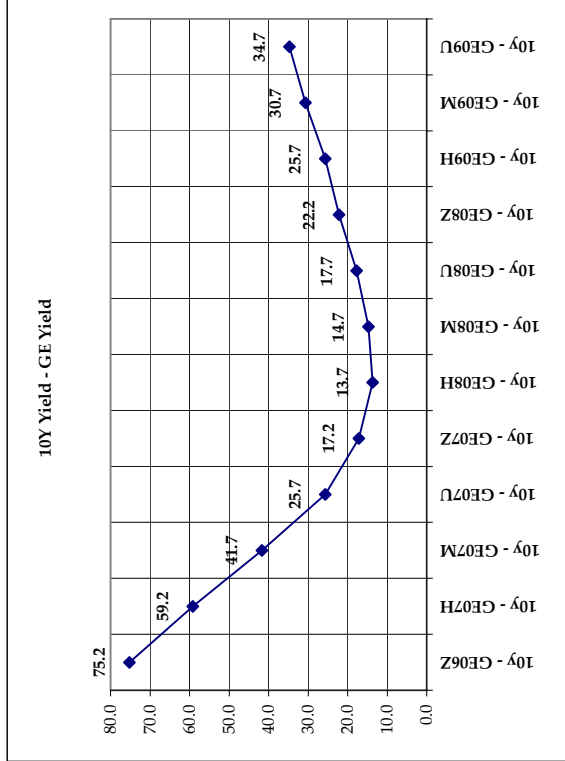
5Y Decimal Price - GE Price



TERM TED: 10y vs Eurodollar Contracts

	Spread Price	10y Yield	Spread	10y	Spread
@GE06Z	5.62	75.2		10y - GE06Z	
@GE07H	5.46	59.2		10y - GE07H	
@GE07M	5.28	41.7		10y - GE07M	
@GE07U	5.12	25.7		10y - GE07U	
@GE07Z	5.04	17.2		10y - GE07Z	
@GE08H	5.00	13.7		10y - GE08H	
@GE08M	5.01	14.7		10y - GE08M	
@GE08U	5.04	17.7		10y - GE08U	
@GE08Z	5.09	22.2		10y - GE08Z	
@GE09H	5.12	25.7		10y - GE09H	
@GE09M	5.17	30.7		10y - GE09M	
@GE09U	5.21	34.7		10y - GE09U	

Last = Outright 10y Decimal Price - Euro contract Price
 Last32 = Amount after decimal in Last column * 32
 Yield = ABS(ZT Proxy Yield - Implied Euro contract yield)



GE Duration as Fraction of year	10Y Duration	Spread Duration
@GE06Z	0.238	7.53
@GE07H	0.487	7.28
@GE07M	0.736	7.03
@GE07U	0.986	6.78
@GE07Z	1.235	6.53
@GE08H	1.484	6.28
@GE08M	1.734	6.03
@GE08U	1.983	5.78
@GE08Z	2.232	5.53
@GE09H	2.482	5.28
@GE09M	2.731	5.03
@GE09U	2.980	4.78

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