



**Minnesota Department of Transportation**

**Memo**

Office of Technical Support  
 Mail Stop 692  
 395 John Ireland Blvd.  
 St. Paul, MN 55155

Office Tel: (651)366-4639  
 Fax: (651)366-4699

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To: Addressees

From: Mary Lacho  
 Estimates Engineer

Subject: Cost Index – 2009 Third Quarter

The Minnesota Highway Construction Composite Cost Index was not computed for the third quarter of 2009, due to the absence of data for five of the six indicator items. Without a unit price for each indicator item, the resulting index is not comparable to previous indices.

- The average Plant Mixed Bituminous cost was \$50.63/ton, down \$3.73/ton or 7% from the third quarter of 2008. Eight projects were considered.

Third quarter, 2009 project information is compared to third quarter 2008 below.

**Indicator Costs**

Item	Third Quarter 2008			Third Quarter 2009		
	Quantity	Cost *	Unit Cost	Quantity	Cost *	Unit Cost
Excavation	CY		/CY	CY		/CY
Reinforcing Steel	1,432,359 lb	\$1.85	\$1.29/lb	lb		/lb
Structural Steel	4,253,020 lb	\$6.51	\$1.53/lb	lb		/lb
Structural Concrete	8,333 CY	\$3.41	\$408.75/CY	CY		/CY
Concrete Pavement	CY		/CY	CY		/CY
Plant-Mixed Bituminous	20,588 ton	\$1.12	\$54.36/ton	218,658 ton	\$11.07	\$50.63/ton
<b>Total</b>		\$12.89			\$11.07	

\* millions of dollars

## Minnesota Highway Construction Project Summary

	2008 Q3	2009 Q3
<b>Number of Projects Awarded</b>	23	42
<b>Awarded Amount (\$ million)</b>	\$39.82	\$32.1
<b>Total Number of Bidders</b>	94	157
<b>Average Number of Bidders</b>	3.6	3.65
<b>Number of Cost Index Projects</b>	4	8
<b>Cost Index Amount (\$ million)</b>	\$12.89	\$11.07
<b>Excavation Index</b>	***	***
<b>Structures Index</b>	***	***
<b>Surfacing Index</b>	***	***
<b>Composite Cost Index (CI)</b>	***	***

\*\*\* Not computed due to the absence of data for associated indicator items.

The average number of bidders per project was 3.6 for the third quarter of 2008. In comparison, the average number of third quarter bidders in 2009 was 3.65.

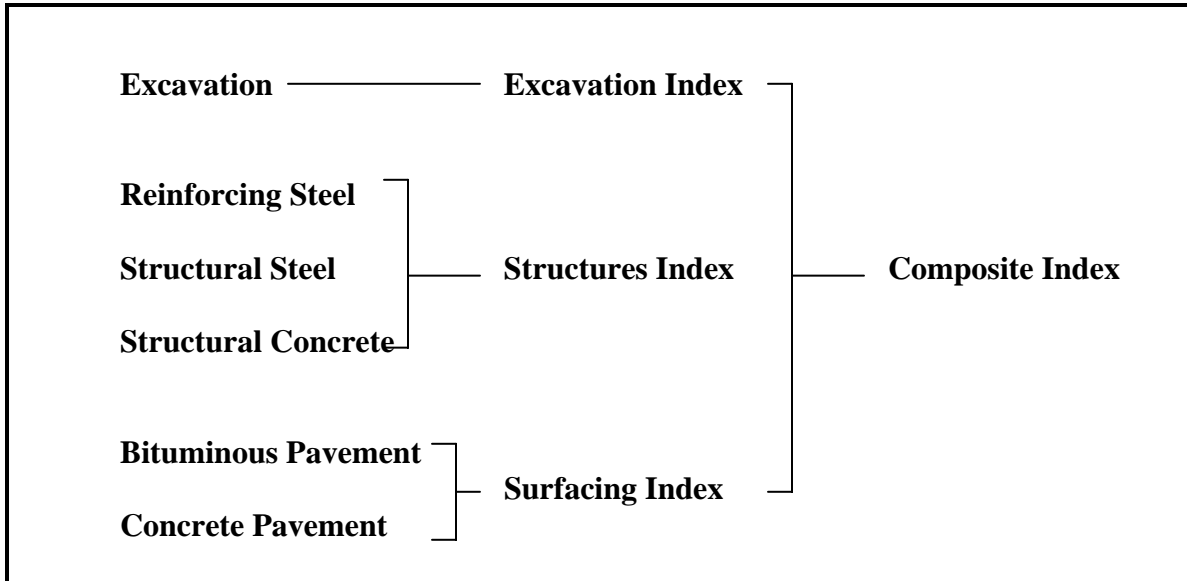
Attached is an explanation of the derivation of the Minnesota Cost index, charts of quarterly and annual Minnesota highway construction cost trends and a table and chart comparing the yearly Minnesota Composite Cost Index with the latest yearly FHWA Index.

cc: File

# Minnesota Construction Cost Index

The Minnesota Construction Cost Index is an indicator of price trends for highway construction.

It is composed of six indicator items: roadway excavation, to indicate the price trends for all roadway excavation; concrete pavement and plant-mixed bituminous, to indicate the price trend for all surfacing types; and reinforcing steel, structural steel, and structural concrete, to indicate the price trend for structures.

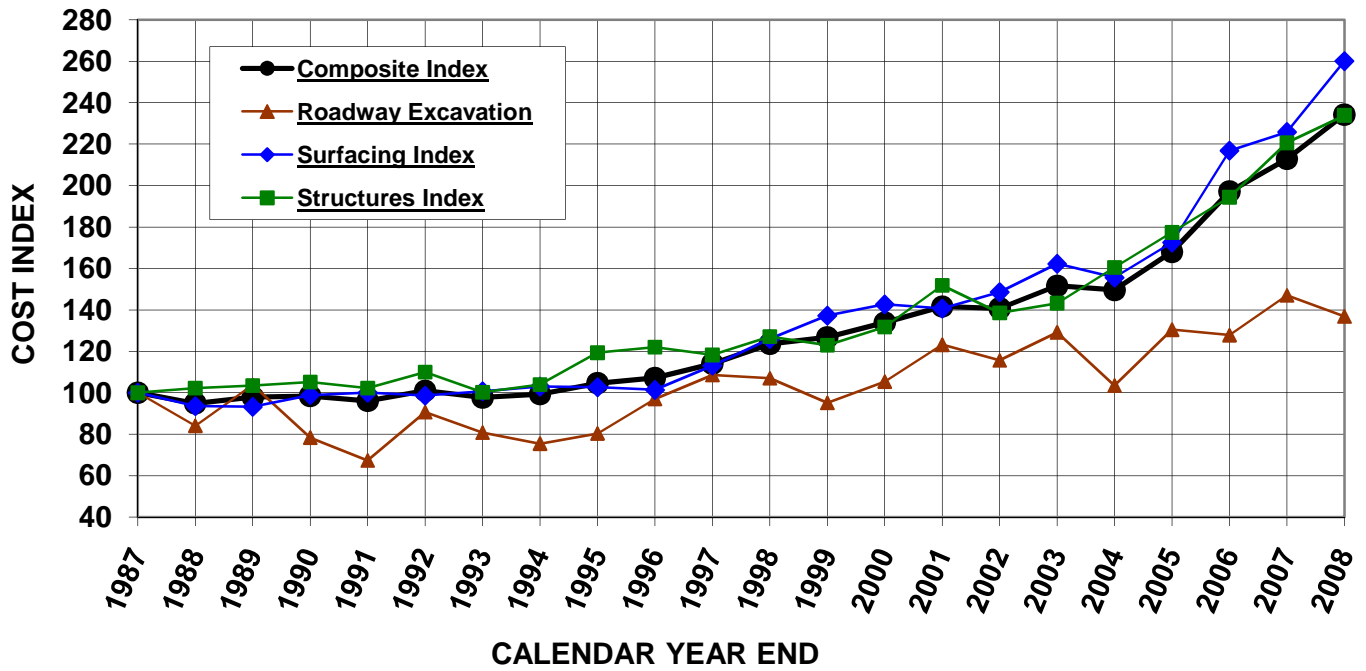


Each quarter, an average unit price is computed for each indicator item. The unit price is based upon the actual bids from projects **excluding Design Build projects**, costing more than \$100,000, and let during that quarter. These unit prices include the cost of material, labor, equipment, overhead and profit.

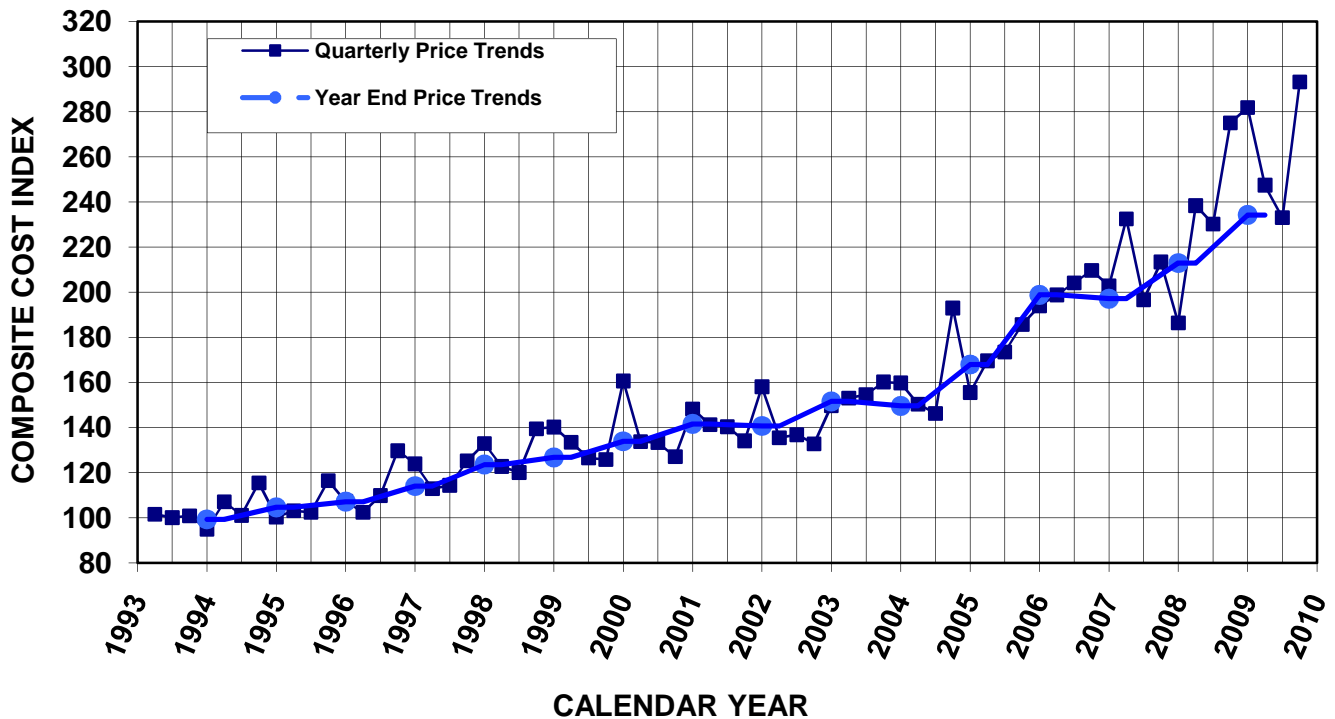
These unit prices along with the 1987 base unit prices and quantities are used to compute the Excavation, Surfacing, Structures and Composite Index.

## Minnesota Highway Construction Cost Trends

### ANNUAL PRICE TRENDS



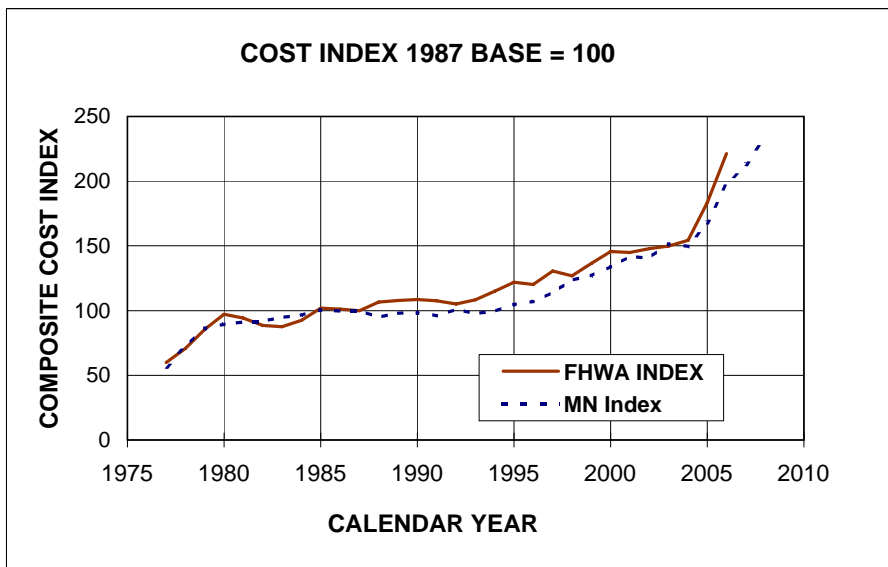
### YEARLY & QUARTERLY PRICE TRENDS



**NOTE:** In 2007, the FHWA stopped collecting Price Trend data, and no longer provide the reports necessary to complete the comparison graphs.

**HIGHWAY CONSTRUCTION COST INDEX 1987 BASE-100**

<u>Year End</u>	<u>FHWA Index</u>	<u>MN Index</u>
1975		
1976		
1977	59.80	56.40
1978	70.70	72.10
1979	85.50	86.30
1980	97.20	89.60
1981	94.20	91.20
1982	88.50	91.80
1983	87.60	94.80
1984	92.60	96.40
1985	102.00	100.70
1986	101.10	99.60
<b>1987</b>	<b>100.00</b>	<b>100.00</b>
1988	106.60	94.90
1989	107.70	97.90
1990	108.50	98.40
1991	107.50	96.00
1992	105.10	101.00
1993	108.30	97.70
1994	115.10	99.30
1995	121.90	104.60
1996	120.20	107.10
1997	130.60	114.00
1998	126.90	123.58
1999	136.50	126.75
2000	145.60	133.91
2001	144.80	141.61
2002	147.90	140.73
2003	149.80	151.60
2004	154.40	149.61
2005	183.60	167.97
2006	221.30	197.10
2007		212.88
2008		234.22
2009		
2010		



1987 Base Year = 100  
 FHWA Index includes projects > \$500,000  
 Mn/DOT Index includes projects > \$100,000

**PRICE TRENDS FOR FEDERAL-AID HIGHWAY CONSTRUCTION**

1987 Base

Year	Common excavation		Surfacing						Structures						Composite index
	Average contract price (cu. yd.)	Index	Portland cement concrete <sup>2</sup>		Bituminous concrete		Surfacing index	Reinforcing steel		Structural steel		Structural concrete		Structures index	
			Average contract price (sq. yd.)	Index	Average contract price (ton)	Index		Average contract price (lb.)	Index	Average contract price (lb.)	Index	Average contract price (cu. yd.)	Index		
1972	.72	29.7	6.42	43.6	9.23	37.5	39.5	.181	41.1	.342	38.6	100.17	41.6	40.7	38.6
1973	.80	33.0	7.00	47.5	10.02	40.7	42.9	.207	47.0	.372	42.0	111.81	46.4	45.4	42.5
1974	1.00	41.2	8.88	60.3	14.74	59.8	60.0	.339	76.9	.551	62.3	136.80	56.8	61.7	57.9
1975	1.03	42.5	8.88	60.3	15.13	61.4	61.0	.297	67.4	.554	62.6	138.76	57.6	60.6	58.1
1976	1.03	42.5	8.92	60.6	14.83	60.2	60.3	.258	58.5	.484	54.7	139.59	58.0	57.2	56.3
1977	1.16	47.8	9.95	67.5	15.47	62.8	64.3	.272	61.7	.520	58.8	143.51	59.6	59.7	59.8
1978	1.54	63.5	11.90	80.8	17.16	69.6	73.3	.316	71.7	.603	68.1	172.41	71.6	70.7	70.7
1979	1.62	66.8	14.02	95.2	21.21	86.1	89.0	.421	95.5	.759	85.8	211.33	87.8	88.6	85.5
1980	1.83	75.5	14.92	101.3	25.29	102.6	102.2	.483	109.6	.941	106.3	226.68	94.1	100.0	97.2
1981	1.76	72.6	14.17	96.2	25.63	104.0	101.4	.438	99.4	.790	89.3	231.64	96.2	94.9	94.2
1982	1.59	65.6	13.03	88.5	24.33	98.7	95.3	.407	92.4	.762	86.1	219.63	91.2	90.0	88.5
1983	1.74	71.8	12.69	86.1	24.27	98.5	94.4	.398	90.3	.708	80.0	213.85	88.8	86.7	87.6
1984	1.90	78.4	13.64	92.6	26.52	107.6	102.7	.409	92.8	.709	80.1	218.02	90.5	88.2	92.6
1985	2.24	92.4	14.31	97.1	28.52	115.7	109.6	.444	100.7	.796	89.9	243.60	101.2	98.1	102.0
1986	2.28	94.0	15.63	106.1	26.48	107.4	107.0	.442	100.3	.850	96.0	236.37	98.2	98.0	101.1
1987	2.42	100.0	14.80	100.0	24.65	100.0	100.0	.441	100.0	.885	100.0	240.81	100.0	100.0	100.0
1988	2.72	112.2	14.33	97.3	24.91	101.1	99.8	.494	112.1	.924	104.4	274.12	113.8	111.0	106.6
1989	2.40	99.0	15.17	103.0	24.08	97.7	99.4	.556	126.2	1.018	115.0	283.40	117.7	118.4	107.7
1990	2.38	98.1	15.91	108.0	24.52	99.5	102.3	.529	120.0	1.010	114.1	286.18	118.8	117.8	108.5
1991	2.32	95.5	16.58	112.5	25.52	103.6	106.5	.505	114.6	1.030	116.4	264.98	110.0	112.5	107.5
1992	2.20	90.8	17.80	120.8	24.66	100.1	106.9	.520	117.9	.916	103.5	259.61	107.8	108.4	105.1
1993	2.50	103.2	18.81	127.7	26.26	106.6	113.5	.467	106.0	.861	97.3	261.89	108.7	105.3	108.3
1994	2.75	113.2	20.88	141.7	27.80	112.8	122.3	.515	116.8	.847	95.7	271.94	112.9	109.0	115.1
1995	2.73	112.8	22.07	149.8	28.87	117.1	127.9	.542	122.9	.922	104.2	302.66	125.7	119.5	121.9
1996	2.92	120.6	19.64	133.3	27.50	111.6	118.7	.581	121.5	1.068	120.7	293.85	122.0	121.6	120.2
1997	2.85	117.6	23.75	161.2	23.39	119.2	133.0	.567	128.7	1.186	134.0	320.90	133.2	132.7	130.6
1998	3.01	124.3	23.65	160.5	25.00	101.4	120.8	.544	123.4	1.111	125.5	337.25	140.0	133.4	126.9
1999	2.93	120.9	23.49	159.5	32.28	130.9	140.3	.554	125.7	1.224	138.3	342.24	142.1	138.3	136.5
2000	3.01	124.1	25.30	171.7	35.15	142.6	152.2	.549	124.6	1.351	152.6	363.66	151.0	146.9	145.6
2001	3.05	125.9	28.21	191.5	34.93	141.7	158.1	.601	136.4	1.201	135.8	339.44	140.9	138.8	144.8
2002	2.94	121.2	25.86	175.5	34.14	138.5	150.7	.610	138.4	1.436	162.2	374.96	155.7	154.5	147.9
2003	3.45	142.3	23.95	162.6	32.54	132.0	142.1	.718	162.9	1.219	137.8	406.02	158.5	159.5	149.8
2004:															
First quarter	2.97	122.4	25.78	174.9	33.61	136.4	149.0	.677	153.5	1.140	128.8	370.83	153.9	147.2	144.3
Second quarter	3.32	136.9	30.60	207.7	35.54	144.2	165.0	.786	178.3	2.455	277.4	402.69	167.2	198.2	175.4
Third quarter	3.33	137.5	23.39	158.8	38.14	154.7	156.1	.828	187.9	1.135	128.2	253.35	105.2	125.4	139.8
Fourth quarter	3.58	147.6	29.69	201.6	40.60	164.7	176.8	.941	213.4	1.419	160.4	365.14	151.6	164.5	166.9
Annual	3.29	135.7	26.97	183.1	36.97	149.9	160.8	.815	184.8	1.521	171.9	331.49	137.6	154.7	154.4
2005:															
First quarter	3.59	147.9	31.49	213.8	39.77	161.3	178.6	1.057	239.8	1.492	168.6	222.72	92.5	137.8	155.9
Second quarter	4.26	175.8	42.67	289.6	43.40	176.1	213.4	1.000	226.8	1.645	185.9	549.70	228.3	216.8	209.2
Third quarter	4.99	205.9	31.58	214.4	54.09	219.4	217.8	.862	195.6	1.717	193.9	507.98	210.9	203.8	209.9
Fourth quarter	3.69	152.3	34.25	232.5	54.36	220.5	224.5	.827	187.6	1.485	167.8	512.35	212.7	196.6	201.3
Annual	3.99	164.6	33.42	226.8	45.56	184.9	198.6	.941	213.6	1.571	177.5	394.88	163.9	176.0	183.6
2006:															
First quarter	4.13	170.4	34.28	232.7	45.99	186.6	201.7	.795	180.4	1.520	171.8	397.21	164.9	169.4	182.8
Second quarter	3.56	146.9	44.04	298.9	59.03	239.5	259.0	.874	198.2	1.701	192.1	728.51	302.5	255.5	240.6
Third quarter	5.31	218.9	29.60	200.9	57.20	232.1	221.8	.928	210.6	1.985	224.2	416.93	173.1	193.0	208.7
Fourth quarter	6.43	265.4	35.56	241.4	59.59	241.8	241.6	.961	218.0	1.710	193.3	628.72	261.1	235.8	242.6
Annual	4.51	186.1	37.94	257.5	55.25	224.2	235.1	.872	197.9	1.736	196.1	574.80	238.7	220.5	221.3

### MN/DOT COST INDEX

<u>Year</u>	<u>Roadway Excavation</u>	<u>Bituminous Surfacing</u>	<u>Concrete Surfacing</u>	<u>Surfacing Index</u>	<u>Reinforce. Steel</u>	<u>Structural Steel</u>	<u>Structural Concrete</u>	<u>Structures Index</u>	<u>Composite Index</u>
<b>1987</b>	100.00	100.00	100.00	100.00	100.00	100.00	100.00	100.00	100.00
<b>1988</b>									
1st Quarter	66.35	92.87	76.99	89.60	108.25	113.11	91.18	98.44	88.98
2nd Quarter	111.84	96.02	107.04	98.29	107.22	103.87	95.60	99.37	100.58
3rd Quarter	87.81	94.14	104.76	96.33	110.27	110.57	110.45	110.43	99.46
4th Quarter	89.72	103.63		103.63	115.44	107.04	94.37	100.80	100.39
Year End	84.08	95.68	85.55	93.59	109.73	109.34	97.90	102.26	94.90
<b>1989</b>									
1st Quarter	121.34	88.57	92.72	89.42	120.87	141.72	101.41	112.36	101.11
137.56	70.45	90.06	87.63	89.56	108.73	102.24	98.24	101.04	90.35
3rd Quarter	137.56	107.54	135.39	113.28	116.66	107.48	94.73	101.34	113.09
4th Quarter		91.13		91.13	138.53	121.78	146.33	140.47	111.64
Year End	103.72	92.01	94.50	93.23	115.99	111.15	97.29	103.45	97.90
<b>1990</b>									
1st Quarter	75.54	100.19	81.67	96.37	115.62	140.73	102.05	111.55	98.06
2nd Quarter	67.71	96.79	104.57	98.39	122.11	105.43	110.57	111.97	98.17
3rd Quarter	97.07	122.17	102.13	118.04	117.17	112.70	92.03	100.67	109.65
4th Quarter	66.99	106.72	148.85	115.41	118.55	108.99	133.76	126.38	111.83
Year End	78.30	100.58	97.24	98.89	117.48	112.81	99.09	105.17	98.41
<b>1991</b>									
1st Quarter	86.48	103.02	111.23	104.71	115.23	123.22	91.37	101.72	101.16
2nd Quarter	67.72	96.75	105.58	98.57	110.99	128.81	103.22	109.27	97.43
3rd Quarter	105.04				122.95		110.48	113.49	110.44
4th Quarter	47.98	81.65	111.81	87.87	106.38	84.44	80.29	86.22	81.62
Year End	67.31	97.72	109.11	100.07	111.54	121.31	93.98	102.28	96.04
<b>1992</b>									
1st Quarter	134.20	110.24	90.36	106.14	106.10	96.66	92.71	96.07	107.07
2nd Quarter	84.69	95.94	103.65	97.53	119.25	109.95	112.93	113.67	100.67
3rd Quarter	90.06	102.36	92.40	100.31	99.53	108.35	131.75	121.22	105.29
4th Quarter	99.54	105.41		105.41	105.69	91.58	116.35	109.83	106.01
Year End	90.60	99.05	97.07	98.64	106.37	105.54	112.38	109.98	100.98
<b>1993</b>									
1st Quarter	81.02	104.73	87.06	101.08	118.06	139.75	102.08	111.88	101.53
2nd Quarter	81.51	101.97	101.79	101.93	109.83	128.78	97.52	105.46	100.08
3rd Quarter		117.01		117.01	97.06		65.66	73.25	100.83
4th Quarter	73.97	94.47	84.12	92.33	119.80	112.58	104.90	109.22	94.91
Year End	80.75	101.91	96.30	100.75	108.13	127.30	90.07	100.21	97.70
<b>1994</b>									
1st Quarter	115.56	97.54	95.57	97.13	115.00	95.98	123.67	120.83	107.11
2nd Quarter	75.92	102.90	104.22	103.17	114.87		109.55	110.84	101.09
3rd Quarter	152.37	109.02	136.56	114.70	99.78	111.66	96.09	99.56	115.44
4th Quarter	65.52	110.42	103.89	109.08	109.23	98.51	98.97	100.93	100.29
Year End	75.38	102.48	104.96	102.99	105.52	110.88	101.55	103.98	99.32
<b>1995</b>									
1st Quarter	85.69	95.53	115.74	99.70	120.72	122.37	114.68	117.23	103.10
2nd Quarter	71.02	99.49		99.49	121.32	132.48	117.95	121.17	102.42
3rd Quarter	77.42	113.46	111.29	113.02	151.42		144.16	145.92	116.46
4th Quarter	92.70	107.55	109.43	107.93	121.52		111.82	114.16	107.29
Year End		99.81	113.94	102.73	121.47	126.83	116.53	119.32	104.63
<b>1996</b>									
1st Quarter	83.05	92.20	123.35	98.62	118.80	178.06	100.96	118.05	102.38
2nd Quarter	119.58	95.01	113.11	98.74	130.48		127.59	128.29	109.88
3rd Quarter	124.27	131.87	150.79	135.77	120.96		119.41	119.79	129.72
4th Quarter	95.12	124.66	113.40	122.34	141.02		144.36	143.55	123.91
Year End	97.01	97.12	117.89	101.40	120.85	178.06	106.59	121.98	107.13
<b>1997</b>									
1st Quarter	117.41	107.57	112.89	108.66	117.44	93.82	125.60	118.39	112.93
2nd Quarter	96.00	107.53	153.26	116.96	129.60	107.48	117.89	118.40	114.38
3rd Quarter	122.35	130.99		130.99	124.92	119.62	116.28	118.59	125.27
4th Quarter	127.75	134.59	0.00	134.59					132.88
Year End	108.51	109.84	125.63	113.10	122.08	99.44	122.32	118.25	114.03
<b>1998</b>									
1st Quarter	100.29	124.56	135.20	126.75	130.86		125.58	126.86	122.75
2nd Quarter	104.63	122.21	133.04	124.44	123.71		118.20	119.53	120.10
3rd Quarter	135.95	150.01	129.84	145.85	133.21		126.04	127.51	139.40
4th Quarter		155.16		155.16	122.66	146.08	110.58	119.22	140.22
Year End	106.99	124.06	132.22	125.95	127.70	146.08	121.58	127.10	123.58

**MN/DOT COST INDEX**

(CONTINUED)

<u>Year</u>	<u>Roadway Excavation</u>	<u>Bituminous Surfacing</u>	<u>Concrete Surfacing</u>	<u>Surfacing Index</u>	<u>Reinforce. Steel</u>	<u>Structural Steel</u>	<u>Structural Concrete</u>	<u>Structures Index</u>	<u>Composite Index</u>
<b>1999</b>									
1st Quarter	90.59	130.95	210.30	147.31	133.64		126.39	128.14	133.51
2nd Quarter	92.34	137.50	139.09	137.83	121.34		121.92	121.78	126.58
3rd Quarter	85.22	135.66		135.66	125.58	168.87	121.78	130.81	125.78
4th Quarter	182.25	143.08	202.56	155.34	132.10	107.12	183.75	160.00	160.66
Year End	95.07	135.87	142.46	137.23	124.73	114.64	124.72	122.95	126.75
<b>2000</b>									
1st Quarter	96.35	141.29	153.08	143.73	142.36	151.96	125.61	133.57	133.77
2nd Quarter	111.93	138.88	158.17	142.86	137.49	136.03	120.21	126.43	133.33
3rd Quarter	102.18	128.03		128.03	137.29		140.48	139.71	127.13
4th Quarter	115.61	136.47	170.73	143.53	149.27		185.41	176.66	148.21
Year End	105.38	138.87	157.19	142.65	139.49	137.59	127.59	131.71	133.91
<b>2001</b>									
1st Quarter	91.27	131.58	133.42	131.96	166.65		196.86	189.55	141.28
2nd Quarter	116.05	135.28	149.20	138.15	135.53	219.62	144.03	155.60	140.36
3rd Quarter	109.17	130.04	154.51	135.09	140.67	166.76	138.68	144.01	134.11
4th Quarter	157.83	160.90	185.56	165.98	149.31	86.82	158.62	144.16	158.06
Year End	123.17	137.25	153.92	140.69	142.53	171.70	149.25	151.85	141.61
<b>2002</b>									
1st Quarter	123.44	147.14	119.78	141.50	151.68	143.03	120.19	130.48	135.49
2nd Quarter	148.48	149.69	140.07	147.71	150.31	165.23	85.03	112.13	136.82
3rd Quarter		132.77		132.77					132.77
4th Quarter	95.26	157.12	161.93	158.12	167.64	154.74	158.85	159.88	149.61
Year End	115.64	150.27	142.16	148.60	159.74	157.32	126.43	138.49	140.73
<b>2003</b>									
1st Quarter	119.16	168.38	149.65	164.51	165.32	124.83	149.85	148.55	153.05
2nd Quarter	149.11	166.29	171.88	167.44	168.38	109.25	130.53	134.34	154.57
3rd Quarter	126.34	162.12	190.96	168.07	166.04		161.37	162.50	160.21
4th Quarter	142.18	144.11		144.11	162.08	139.53	213.05	189.98	159.77
Year End	129.12	163.83	156.17	162.25	166.37	116.91	143.23	143.23	151.60
<b>2004</b>									
1st Quarter	89.34	157.99	145.67	155.45	184.40	166.06	166.16	169.78	150.36
2nd Quarter	101.93	156.99	153.21	156.21	193.40		135.92	149.83	146.23
3rd Quarter	156.87	173.66	220.06	183.23	231.70	126.15	253.80	226.99	192.95
4th Quarter	171.37	153.88	126.70	148.28	175.45	195.43	146.69	160.98	155.53
Year End	103.48	159.35	141.15	155.60	191.19	162.96	150.02	160.50	149.61
<b>2005</b>									
1st Quarter	91.95	159.35	221.30	172.12	206.72	281.37	176.99	201.24	169.57
2nd Quarter	152.75	163.52	230.40	177.31	206.89	201.87	159.27	176.24	173.44
3rd Quarter	135.85	214.40	173.97	206.06	195.34	199.90	158.17	172.91	185.71
4th Quarter	131.93	211.41		211.41	219.49		192.75	199.22	193.94
Year End	130.43	169.66	183.55	172.53	202.26	201.13	162.78	177.39	167.97
<b>2006</b>									
1st Quarter	179.64	216.37	168.40	206.48	209.17	167.23	196.99	194.19	198.82
2nd Quarter	137.70	241.00	191.38	230.77	192.81	194.21	184.52	187.87	204.11
3rd Quarter	137.17	217.53	*	**	257.26	*	230.67	**	**
4th Quarter	95.01	228.13	*	**	247.81	*	212.00	**	**
Year End	127.80	228.04	173.91	216.88	205.99	183.53	193.74	194.39	197.10
<b>2007</b>									
1st Quarter	190.17	255.61	222.49	248.78	236.81	283.08	202.21	223.31	232.47
2nd Quarter	114.76	224.06	155.14	209.85	221.84	187.19	214.66	211.27	196.60
3rd Quarter	* /**	213.40	*	**	*	*	*	**	**
4th Quarter	117.03	209.36	*	**	*	*	*	**	**
Year End	147.02	232.91	198.59	225.84	233.69	262.24	204.79	220.64	212.88
<b>2008</b>									
1st Quarter	143.43	235.23	361.90	261.34	409.19	*	189.70	**	**
2nd Quarter	134.37	278.48	170.51	256.22	286.47	267.39	199.61	228.83	230.20
3rd Quarter	* /**	314.60	*	**	295.44	215.32	196.42	219.48	**
4th Quarter	217.71	350.82	*	**	242.71	*	187.20	**	**
Year End	136.85	282.00	175.62	260.06	349.63	239.92	195.24	233.87	234.22
<b>2009</b>									
1st Quarter	130.35	267.53	179.27	249.34	212.65	703.64	212.26	298.60	247.42
2nd Quarter	205.07	254.33	210.92	245.38	220.70	249.11	218.60	224.37	233.08
3rd Quarter	* /**	293.20	*	**	*	*	*	**	**

\* No information available

\*\*Not computed due to the absence of data for indicator item(s).