
Runoff Curve Number Calculations

Worksheet 2: Runoff curve number and runoff

Project: Goodwives River (MMI# 1581-04-2-4) By: SJB Date: 05/18/09
 Location: Darien & New Canaan Checked: _____ Date: _____
 Circle one: Present Developed Watershed: GR T0-010

1.) Runoff curve number (CN)

Soil Name and Hydrologic Group (Appendix A)	Cover Description (cover type, treatment, and hydrologic condition; percent impervious; unconnected/connected impervious area ratio)	CN Value ^{1.}			Area <u>Acres</u> Sq. Ft. %	Product of CN x Area
		Table 2-2	Figure 2-3	Figure 2-4		
C	Impervious Paved (including ROW)	88			0.31	27.57
C	Residential - 2 acre	73			4.35	317.19
C	Woods - Good	70			0.05	3.42
D	Impervious Paved (including ROW)	91			0.49	44.67
D	Residential - 2 acre	80			5.60	448.12
D	Woods - Fair	79			1.25	99.08
D	Woods - Good	77			0.86	66.23
D	Woods - MMI	67			0.65	43.53
Totals =					13.56	1,049.80
					(0.02119	sq mi)

^{1.} Use only one CN value source per line.

$$\text{CN (weighted)} = \frac{\text{total product}}{\text{total area}} = \frac{1,049.80}{13.56} \quad \text{Use CN} = \boxed{77}$$

Worksheet 2: Runoff curve number and runoff

Project: Goodwives River (MMI# 1581-04-2-4) By: SJB Date: 05/18/09
 Location: Darien & New Canaan Checked: _____ Date: _____
 Circle one: Present Developed Watershed: GR T1-070

1.) Runoff curve number (CN)

Soil Name and Hydrologic Group (Appendix A)	Cover Description (cover type, treatment, and hydrologic condition; percent impervious; unconnected/connected impervious area ratio)	CN Value ^{1.}			Area Acres Sq. Ft. %	Product of CN x Area
		Table 2-2	Figure 2-3	Figure 2-4		
B	Impervious Paved (including ROW)	83			0.05	4.25
B	Residential - 1 acre	61			0.92	56.15
B	Residential - 2 acre	60			0.21	12.70
B	Woods - Poor	66			0.04	2.48
C	Open Space - Fair	79			0.36	28.71
C	Impervious Paved (including ROW)	88			4.10	360.47
C	Residential - 1 acre	74			4.09	302.52
C	Residential - 2 acre	73			21.42	1,563.37
C	Woods - Good	70			0.19	13.63
C	Woods - MMI	60			3.30	198.17
D	Open Space - Good	74			0.01	0.55
D	Impervious Paved (including ROW)	91			1.13	102.74
D	Residential - 1 acre	80			5.01	400.93
D	Residential - 2 acre	80			9.05	724.09
D	Woods - Good	77			0.34	26.36
D	Woods - MMI	67			7.04	471.98
Totals =					57.27	4,269.11
					(0.089	sq mi)

^{1.} Use only one CN value source per line.

$$\text{CN (weighted)} = \frac{\text{total product}}{\text{total area}} = \frac{4,269.11}{57.27} \quad \text{Use CN} = \boxed{75}$$

Worksheet 2: Runoff curve number and runoff

Project: Goodwives River (MMI# 1581-04-2-4) By: SJB Date: 05/18/09
 Location: Darien & New Canaan Checked: _____ Date: _____
 Circle one: Present Developed Watershed: GR T1-TA

1.) Runoff curve number (CN)

Soil Name and Hydrologic Group (Appendix A)	Cover Description (cover type, treatment, and hydrologic condition; percent impervious; unconnected/connected impervious area ratio)	CN Value ^{1.}			Area Acres Sq. Ft. %	Product of CN x Area
		Table 2-2	Figure 2-3	Figure 2-4		
B	Residential - 2 acre	60			1.81	108.44
B	Woods - Fair	60			0.02	1.19
B	Woods - Good	55			0.03	1.77
C	Impervious Paved (including ROW)	88			1.31	115.42
C	Residential - 2 acre	73			16.03	1,169.90
C	Woods - MMI	60			0.47	28.28
D	Impervious Paved (including ROW)	91			1.59	144.70
D	Residential - 2 acre	80			6.67	533.31
D	Woods - Good	77			0.76	58.44
Totals =					28.68	2,161.45
					(0.045	sq mi)

^{1.} Use only one CN value source per line.

$$\text{CN (weighted)} = \frac{\text{total product}}{\text{total area}} = \frac{2,161.45}{28.68} \quad \text{Use CN} = \boxed{75}$$

Worksheet 2: Runoff curve number and runoff

Project: Goodwives River (MMI# 1581-04-2-4) By: SJB Date: 05/18/09
 Location: Darien & New Canaan Checked: _____ Date: _____
 Circle one: Present Developed Watershed: GR T1-TB

1.) Runoff curve number (CN)

Soil Name and Hydrologic Group (Appendix A)	Cover Description (cover type, treatment, and hydrologic condition; percent impervious; unconnected/connected impervious area ratio)	CN Value ^{1.}			Area Acres Sq. Ft. %	Product of CN x Area
		Table 2-2	Figure 2-3	Figure 2-4		
B	Impervious Paved (including ROW)	83			0.17	14.41
B	Residential - 2 acre	60			2.18	130.77
B	Woods - MMI	50			0.30	14.85
C	Open Space - Good	74			0.27	20.06
C	Impervious Paved (including ROW)	88			3.12	274.49
C	Residential - 1 acre	74			7.77	574.84
C	Residential - 2 acre	73			12.37	902.92
C	Woods - Good	70			0.16	11.35
D	Impervious Paved (including ROW)	91			1.68	152.89
D	Residential - 2 acre	80			4.44	355.20
D	Water	98			0.01	0.98
D	Woods - Fair	79			0.05	4.01
D	Woods - Good	77			0.50	38.86
D	Woods - MMI	67			0.37	24.84
Totals =					33.40	2,520.47
					(0.05218	sq mi)

^{1.} Use only one CN value source per line.

$$\text{CN (weighted)} = \frac{\text{total product}}{\text{total area}} = \frac{2,520.47}{33.40} \quad \text{Use CN} = \boxed{75}$$

Worksheet 2: Runoff curve number and runoff

Project: Goodwives River (MMI# 1581-04-2-4) By: SJB Date: 05/18/09
 Location: Darien & New Canaan Checked: _____ Date: _____
 Circle one: Present Developed Watershed: GR T2-010

1.) Runoff curve number (CN)

Soil Name and Hydrologic Group (Appendix A)	Cover Description (cover type, treatment, and hydrologic condition; percent impervious; unconnected/connected impervious area ratio)	CN Value ^{1.}			Area <u>Acres</u> Sq. Ft. %	Product of CN x Area
		Table 2-2	Figure 2-3	Figure 2-4		
B	Urban Commercial	92			1.59	146.28
C	Open Space - Fair	79			10.51	829.91
C	Residential - 2 acre	73			3.89	283.69
D	Open Space - Fair	84			3.40	285.80
Totals =					19.38	1,545.67
					(0.03029	sq mi)

^{1.} Use only one CN value source per line.

CN (weighted) = $\frac{\text{total product}}{\text{total area}}$ = $\frac{1,545.67}{19.38}$ Use CN = 80

Worksheet 2: Runoff curve number and runoff

Project: Goodwives River (MMI# 1581-04-2-4) By: SJB Date: 05/18/09
 Location: Darien & New Canaan Checked: _____ Date: _____
 Circle one: Present Developed Watershed: GR T3-020

1.) Runoff curve number (CN)

Soil Name and Hydrologic Group (Appendix A)	Cover Description (cover type, treatment, and hydrologic condition; percent impervious; unconnected/connected impervious area ratio)	CN Value ^{1.}			Area Acres Sq. Ft. %	Product of CN x Area
		Table 2-2	Figure 2-3	Figure 2-4		
C	Open Space - Good	74			6.46	478.21
C	Impervious Paved (including ROW)	88			0.85	75.19
C	Residential - 1 acre	74			3.00	221.86
C	Residential - 1/2 acre	76			0.92	70.06
C	Residential - 2 acre	73			2.60	190.06
C	Woods - Good	70			0.40	27.73
D	Open Space - Good	80			4.84	387.33
D	Impervious Paved (including ROW)	91			2.69	245.18
D	Residential - 1 acre	80			18.60	1,488.20
D	Residential - 1/2 acre	82			0.08	6.17
D	Residential - 2 acre	80			0.45	36.36
D	Woods - Fair	79			0.45	35.22
D	Woods - Good	77			0.88	67.81
D	Woods - MMI	67			0.44	29.78
Totals =					42.68	3,359.17
					(0.06668	sq mi)

^{1.} Use only one CN value source per line.

$$\text{CN (weighted)} = \frac{\text{total product}}{\text{total area}} = \frac{3,359.17}{42.68} \quad \text{Use CN} = \boxed{79}$$

Worksheet 2: Runoff curve number and runoff

Project: Goodwives River (MMI# 1581-04-2-4) By: SJB Date: 05/18/09
 Location: Darien & New Canaan Checked: _____ Date: _____
 Circle one: Present Developed Watershed: GR T5-010

1.) Runoff curve number (CN)

Soil Name and Hydrologic Group (Appendix A)	Cover Description (cover type, treatment, and hydrologic condition; percent impervious; unconnected/connected impervious area ratio)	CN Value ^{1.}			Area <u>Acres</u> Sq. Ft. %	Product of CN x Area
		Table 2-2	Figure 2-3	Figure 2-4		
B	Open Space - Good	61			2.15	131.32
B	Impervious Paved (including ROW)	83			0.56	46.83
B	Residential - 1 acre	61			0.02	1.02
B	Residential - 1/2 acre	64			1.15	73.34
B	Residential - 1/3 acre	65			0.07	4.78
B	Residential - 2 acre	60			0.01	0.48
B	Urban Commercial	92			1.04	95.90
C	Open Space - Good	74			0.78	57.45
C	Open Space - MMI	70			0.00	0.17
C	Impervious Paved (including ROW)	88			3.00	264.12
C	Residential - 1 acre	71			11.41	810.32
C	Residential - 1/2 acre	76			6.37	484.12
C	Residential - 1/3 acre	77			1.48	114.32
C	Residential - 1/4 acre	78			0.09	6.76
C	Residential - 2 acre	73			1.87	136.68
C	Woods - Good	70			0.00	0.01
D	Impervious Paved (including ROW)	91			1.19	108.07
D	Residential - 1 acre	80			1.93	154.45
D	Residential - 1/2 acre	82			0.00	0.02
D	Residential - 1/3 acre	82			0.25	20.60
D	Woods - Good	77			0.26	20.05
Totals =					33.64	2,530.83

^{1.} Use only one CN value source per line.

(0.05256 sq mi)

$$\text{CN (weighted)} = \frac{\text{total product}}{\text{total area}} = \frac{2,530.83}{33.64} \quad \text{Use CN} = \boxed{75}$$

Worksheet 2: Runoff curve number and runoff

Project: Goodwives River (MMI# 1581-04-2-4) By: SJB Date: 05/18/09
 Location: Darien & New Canaan Checked: _____ Date: _____
 Circle one: Present Developed Watershed: GR T5-020

1.) Runoff curve number (CN)

Soil Name and Hydrologic Group (Appendix A)	Cover Description (cover type, treatment, and hydrologic condition; percent impervious; unconnected/connected impervious area ratio)	CN Value ^{1.}			Area Acres Sq. Ft. %	Product of CN x Area
		Table 2-2	Figure 2-3	Figure 2-4		
B	Open Space - Good	69			0.01	0.46
B	Impervious Paved	98			0.01	0.76
B	Impervious Paved (including ROW)	83			4.04	335.50
B	Residential - 1 acre	61			1.62	98.72
B	Residential - 1/2 acre	64			18.96	1,213.65
B	Residential - 1/3 acre	65			9.02	586.58
B	Residential - 1/8 acre	70			1.42	99.32
B	Woods - Fair	60			0.30	18.24
B	Woods - Good	55			0.36	19.88
C	Impervious Paved	98			0.01	1.43
C	Impervious Paved (including ROW)	88			1.32	116.14
C	Residential - 1 acre	74			0.12	9.17
C	Residential - 1/2 acre	76			2.05	155.61
C	Residential - 1/3 acre	77			0.12	9.46
C	Residential - 1/4 acre	78			0.77	59.91
D	Impervious Paved (including ROW)	91			0.70	63.50
D	Residential - 1 acre	80			0.38	30.76
D	Residential - 1/2 acre	82			2.09	171.36
D	Residential - 1/3 acre	82			1.60	131.61
D	Woods - Fair	79			0.56	44.12
D	Woods - Good	77			1.02	78.62
Totals =					46.50	3,244.80

^{1.} Use only one CN value source per line.

(0.07266 sq mi)

$$\text{CN (weighted)} = \frac{\text{total product}}{\text{total area}} = \frac{3,244.80}{46.50} \text{ Use CN} = \boxed{70}$$

Worksheet 2: Runoff curve number and runoff

Project: Goodwives River (MMI# 1581-04-2-4) By: SJB Date: 05/18/09
 Location: Darien & New Canaan Checked: _____ Date: _____
 Circle one: Present Developed Watershed: GR T5-040

1.) Runoff curve number (CN)

Soil Name and Hydrologic Group (Appendix A)	Cover Description (cover type, treatment, and hydrologic condition; percent impervious; unconnected/connected impervious area ratio)	CN Value ^{1.}			Area Acres Sq. Ft. %	Product of CN x Area
		Table 2-2	Figure 2-3	Figure 2-4		
B	Impervious Gravel (including ROW)	85			2.68	227.66
B	Impervious Paved	98			4.39	430.11
B	Impervious Paved (including ROW)	83			5.11	423.92
B	Residential - 1/2 acre	64			4.70	300.72
B	Residential - 1/3 acre	65			3.30	214.75
B	Residential - 1/4 acre	67			10.56	707.61
B	Residential - 1/8 acre	70			2.80	196.34
B	Urban Commercial	92			17.66	1,625.10
B	Woods - Fair	60			0.91	54.78
B	Woods - Good	66			0.86	57.07
B	Woods/Grass - Fair	65			1.55	100.43
D	Residential - 1/4 acre	83			0.39	32.23
D	Urban Commercial	95			0.61	57.89
Totals =					55.53	4,428.63
					(0.08676	sq mi)

^{1.} Use only one CN value source per line.

$$\text{CN (weighted)} = \frac{\text{total product}}{\text{total area}} = \frac{4,428.63}{55.53} \quad \text{Use CN} = \boxed{80}$$

Worksheet 2: Runoff curve number and runoff

Project: Goodwives River (MMI# 1581-04-2-4) By: SJB Date: 05/18/09
 Location: Darien & New Canaan Checked: _____ Date: _____
 Circle one: **Present** Developed Watershed: GR T6-010

1.) Runoff curve number (CN)

Soil Name and Hydrologic Group (Appendix A)	Cover Description (cover type, treatment, and hydrologic condition; percent impervious; unconnected/connected impervious area ratio)	CN Value ^{1.}			Area <u>Acres</u> Sq. Ft. %	Product of CN x Area
		Table 2-2	Figure 2-3	Figure 2-4		
B	Impervious Paved (including ROW)	83			3.64	302.18
B	Residential - 1/2 acre	64			3.85	246.48
B	Urban Commercial	89			6.02	535.77
B	Woods - Good	55			2.81	154.45
Totals =					16.32	1,238.88
					(0.02550	sq mi)

^{1.} Use only one CN value source per line.

CN (weighted) = $\frac{\text{total product}}{\text{total area}}$ = $\frac{1,238.88}{16.32}$ Use CN = 76

Worksheet 2: Runoff curve number and runoff

Project: Goodwives River (MMI# 1581-04-2-4) By: SJB Date: 05/18/09
 Location: Darien & New Canaan Checked: _____ Date: _____
 Circle one: **Present** Developed Watershed: GR T7-010

1.) Runoff curve number (CN)

Soil Name and Hydrologic Group (Appendix A)	Cover Description (cover type, treatment, and hydrologic condition; percent impervious; unconnected/connected impervious area ratio)	CN Value ^{1.}			Area Acres Sq. Ft. %	Product of CN x Area
		Table 2-2	Figure 2-3	Figure 2-4		
B	Impervious Paved (ROW)	89			1.41	125.51
B	Residential - 1 acre	61			2.73	166.67
B	Residential - 2 acre	60			3.47	208.26
B	Woods - Good	55			0.24	13.41
D	Impervious Paved (ROW)	91			3.17	288.31
D	Residential - 1 acre	80			18.32	1,465.43
D	Residential - 2 acre	80			8.94	715.18
D	Woods - Good	77			0.01	0.51
D	Woods/Grass - Fair	82			0.69	56.43
Totals =					38.98	3,039.73
					(0.06090	sq mi)

^{1.} Use only one CN value source per line.

$$\text{CN (weighted)} = \frac{\text{total product}}{\text{total area}} = \frac{3,039.73}{38.98} \quad \text{Use CN} = \boxed{78}$$

Worksheet 2: Runoff curve number and runoff

Project: Goodwives River (MMI# 1581-04-2-4) By: SJB Date: 05/15/09
 Location: Darien & New Canaan Checked: _____ Date: _____
 Circle one: Present Developed Watershed: GR MS-020

1.) Runoff curve number (CN)

Soil Name and Hydrologic Group (Appendix A)	Cover Description (cover type, treatment, and hydrologic condition; percent impervious; unconnected/connected impervious area ratio)	CN Value ^{1.}			Area <u>Acres</u> Sq. Ft. %	Product of CN x Area
		Table 2-2	Figure 2-3	Figure 2-4		
C	Open Space - Good	74			0.67	49.63
C	Impervious Paved (including ROW)	88			2.57	226.27
C	Residential - 2 acre	73			15.79	1,152.84
C	Woods - Fair	73			1.38	100.87
C	Woods - MMI	60			0.69	41.23
D	Impervious Paved (including ROW)	91			1.27	116.02
D	Residential - 2 acre	80			2.75	220.36
D	Woods - MMI	77			3.50	269.66
Totals =					28.63	2,176.89
					(0.04474	sq mi)

^{1.} Use only one CN value source per line.

CN (weighted) = $\frac{\text{total product}}{\text{total area}}$ = $\frac{2,176.89}{28.63}$ Use CN = 76

Worksheet 2: Runoff curve number and runoff

Project: Goodwives River (MMI# 1581-04-2-4) By: SJB Date: 05/15/09
 Location: Darien & New Canaan Checked: _____ Date: _____
 Circle one: Present Developed Watershed: GR MS-130

1.) Runoff curve number (CN)

Soil Name and Hydrologic Group (Appendix A)	Cover Description (cover type, treatment, and hydrologic condition; percent impervious; unconnected/connected impervious area ratio)	CN Value ^{1.}			Area <u>Acres</u> Sq. Ft. %	Product of CN x Area
		Table 2-2	Figure 2-3	Figure 2-4		
C	Open Space - Good	74			0.49	36.33
C	Impervious Paved (including ROW)	88			5.25	461.99
C	Residential - 1 acre	74			4.05	299.67
C	Residential - 1/2 acre	76			13.84	1,052.13
C	Residential - 1/3 acre	77			2.69	207.31
C	Residential - 1/4 acre	78			0.21	16.59
C	Residential - 1/8 acre	80			0.25	20.30
C	Residential - 2 acre	73			1.19	86.97
C	Urban Commercial	94			1.35	126.53
C	Woods - Fair	73			0.55	39.97
C	Woods - Good	70			0.37	25.74
D	Open Space - Good	80			0.19	15.44
D	Impervious Paved (including ROW)	91			0.92	84.05
D	Residential - 1 acre	80			2.26	180.90
D	Residential - 1/2 acre	82			2.84	232.99
D	Residential - 1/3 acre	82			1.71	140.23
D	Residential - 1/8 acre	85			0.02	1.60
D	Urban Commercial	95			0.00	0.36
D	Woods - Fair	79			0.26	20.87
D	Woods - MMI	67			0.28	18.53

^{1.} Use only one CN value source per line.

Totals = 38.74 3,068.51
 (0.06053 sq mi)

$$\text{CN (weighted)} = \frac{\text{total product}}{\text{total area}} = \frac{3,068.51}{38.74} \quad \text{Use CN} = \span style="border: 2px solid black; padding: 5px;">79$$

Worksheet 2: Runoff curve number and runoff

Project: Goodwives River (MMI# 1581-04-2-4) By: SJB Date: 05/15/09
 Location: Darien & New Canaan Checked: _____ Date: _____
 Circle one: Present Developed Watershed: GR MS-140

1.) Runoff curve number (CN)

Soil Name and Hydrologic Group (Appendix A)	Cover Description (cover type, treatment, and hydrologic condition; percent impervious; unconnected/connected impervious area ratio)	CN Value ^{1.}			Area <u>Acres</u> Sq. Ft. %	Product of CN x Area
		Table 2-2	Figure 2-3	Figure 2-4		
C	Open Space - Good	74			0.02	1.21
C	Impervious Paved	98			0.00	0.00
C	Impervious Paved (including ROW)	88			5.21	458.81
C	Residential - 1 acre	74			0.02	1.31
C	Residential - 1/2 acre	76			1.97	150.09
C	Residential - 1/3 acre	77			1.90	146.08
C	Residential - 1/4 acre	78			0.74	57.81
C	Residential - 1/8 acre	80			1.26	101.14
C	Urban Commercial	94			8.93	839.04
C	Woods - Fair	73			0.10	7.23
C	Woods - Good	70			0.73	50.84
D	Impervious Paved	98			0.00	0.00
D	Impervious Paved (including ROW)	91			0.25	22.34
D	Residential - 1/3 acre	82			0.66	54.42
D	Urban Commercial	95			0.83	79.26
D	Woods - Fair	79			0.02	1.90
D	Woods - Good	77			1.19	91.25

^{1.} Use only one CN value source per line.

Totals = 23.83 2,062.74
 (0.03723 sq mi)

$$\text{CN (weighted)} = \frac{\text{total product}}{\text{total area}} = \frac{2,062.74}{23.83} \quad \text{Use CN} = \span style="border: 2px solid black; padding: 5px;">87$$

Worksheet 2: Runoff curve number and runoff

Project: Goodwives River (MMI# 1581-04-2-4) By: SJB Date: 05/15/09
 Location: Darien & New Canaan Checked: _____ Date: _____
 Circle one: Present Developed Watershed: WS CB-10

1.) Runoff curve number (CN)

Soil Name and Hydrologic Group (Appendix A)	Cover Description (cover type, treatment, and hydrologic condition; percent impervious; unconnected/connected impervious area ratio)	CN Value ^{1.}			Area Acres Sq. Ft. %	Product of CN x Area
		Table 2-2	Figure 2-3	Figure 2-4		
B	Open Space - Good	61			0.03	1.80
B	Impervious Gravel (including ROW)	85			0.66	56.17
B	Impervious Paved	98			0.23	22.16
B	Impervious Paved (including ROW)	83			2.07	171.44
B	Residential - 1 acre	61			0.44	27.00
B	Residential - 1/2 acre	64			1.24	79.28
B	Residential - 1/3 acre	65			1.39	90.37
B	Residential - 1/8 acre	70			0.14	10.13
B	Urban Commercial	92			2.21	203.55
B	Woods - Good	55			0.06	3.44
B	Woods/Grass - Fair	43			0.73	
C	Open Space - Good	74			0.02	1.70
C	Impervious Paved	98			0.07	6.71
C	Impervious Paved (including ROW)	88			0.00	0.18
C	Residential - 1 acre	74			7.40	547.38
C	Residential - 1/2 acre	76			2.82	213.99
C	Residential - 1/3 acre	77			5.44	418.94
C	Residential - 1/4 acre	78			4.40	342.92
C	Residential - 1/8 acre	80			0.25	20.29
C	Urban Commercial	94			1.74	163.63
C	Woods - Fair	73			17.52	1,278.91
C	Woods - Good	70			0.05	3.64
					0.02	
Totals =					48.93	3,663.64
					(0.07645	sq mi)

^{1.} Use only one CN value source per line.

$$\text{CN (weighted)} = \frac{\text{total product}}{\text{total area}} = \frac{3,663.64}{48.93} \quad \text{Use CN} = \boxed{75}$$

Worksheet 2: Runoff curve number and runoff

Project: Goodwives River (MMI# 1581-04-2-4) By: SJB Date: 05/26/09
 Location: Darien & New Canaan Checked: _____ Date: _____
 Circle one: Present Developed Watershed: GR MS-160

1.) Runoff curve number (CN)

Soil Name and Hydrologic Group (Appendix A)	Cover Description (cover type, treatment, and hydrologic condition; percent impervious; unconnected/connected impervious area ratio)	CN Value ^{1.}			Area Acres Sq. Ft. %	Product of CN x Area
		Table 2-2	Figure 2-3	Figure 2-4		
B	Open Space - Good	61			1.11	67.44
B	Impervious Gravel (including ROW)	85			2.79	236.81
B	Impervious Paved	98			0.00	0.04
B	Impervious Paved (including ROW)	83			7.81	647.89
B	Residential - 1 acre	61			1.73	105.79
B	Residential - 1/2 acre	64			3.84	246.03
B	Residential - 2 acre	60			1.25	75.13
B	Urban Commercial	92			16.15	1,486.03
B	Woods - Fair	60			0.65	39.23
B	Woods - Good	55			2.69	147.71
B	Woods - MMI	50			0.65	32.63
B	Woods/Grass - Fair	65			0.26	17.15
C	Gravel (including ROW)	89			0.03	2.64
C	Impervious Paved (including ROW)	92			0.00	0.13
D	Urban Commercial	94			0.01	0.97
D	Impervious Paved (including ROW)	80			0.41	33.10
D	Residential - 1 acre	80			0.62	49.42
D	Residential - 1/2 acre	82			2.72	222.98
D	Residential - 2 acre	80			0.85	68.00
D	Urban Commercial	95			1.51	143.20
D	Woods - MMI	67			1.64	109.85
Totals =					46.73	3,732.16
					(0.07301	sq mi)

^{1.} Use only one CN value source per line.

$$\text{CN (weighted)} = \frac{\text{total product}}{\text{total area}} = \frac{3,732.16}{46.73} \quad \text{Use CN} = \boxed{80}$$

Worksheet 2: Runoff curve number and runoff

Project: Goodwives River (MMI# 1581-04-2-4) By: SJB Date: 05/26/09
 Location: Darien & New Canaan Checked: _____ Date: _____
 Circle one: Present Developed Watershed: GR MS-170

1.) Runoff curve number (CN)

Soil Name and Hydrologic Group (Appendix A)	Cover Description (cover type, treatment, and hydrologic condition; percent impervious; unconnected/connected impervious area ratio)	CN Value ^{1.}			Area Acres Sq. Ft. %	Product of CN x Area
		Table 2-2	Figure 2-3	Figure 2-4		
B	Impervious Paved (including ROW)	83			3.49	289.45
B	Urban Commercial	92			2.79	256.40
B	Woods - Good	55			1.79	98.30
B	Woods - MMI	50			0.25	12.61
D	Urban Commercial	95			2.69	255.80
D	Woods - Good	77			0.13	10.17
D	Woods - MMI	67			0.49	32.59
Totals =					11.62	955.32

^{1.} Use only one CN value source per line.

(0.01816 sq mi)

CN (weighted) = $\frac{\text{total product}}{\text{total area}}$ = $\frac{955.32}{11.62}$ Use CN = 82

Worksheet 2: Runoff curve number and runoff

Project: Goodwives River (MMI# 1581-04-2-4) By: SJB Date: 05/15/09
 Location: Darien & New Canaan Checked: _____ Date: _____
 Circle one: Present Developed Watershed: GR MS-180

1.) Runoff curve number (CN)

Soil Name and Hydrologic Group (Appendix A)	Cover Description (cover type, treatment, and hydrologic condition; percent impervious; unconnected/connected impervious area ratio)	CN Value ^{1.}			Area Acres Sq. Ft. %	Product of CN x Area
		Table 2-2	Figure 2-3	Figure 2-4		
B	Impervious Paved (including ROW)	83			3.51	291.39
B	Residential - 1 acre	61			3.66	223.52
B	Residential - 1/2 acre	64			4.09	261.63
B	Residential - 2 acre	60			0.41	24.81
B	Woods - Good	55			3.51	193.18
B	Woods - MMI	50			0.68	33.79
D	Open Space - Good	80			0.00	0.00
D	Impervious Paved (including ROW)	91			4.30	391.44
D	Residential - 1 acre	80			18.40	1,471.77
D	Residential - 1/2 acre	82			8.16	669.47
D	Residential - 1/3 acre	86			0.41	35.25
D	Residential - 2 acre	80			3.26	261.01
D	Woods - Good	77			4.59	353.55
D	Woods - MI	67			0.41	27.76
Totals =					55.41	4,210.82
					(0.08657 sq mi)

^{1.} Use only one CN value source per line.

CN (weighted) = $\frac{\text{total product}}{\text{total area}}$ = $\frac{4,210.82}{55.41}$ Use CN = 76

Worksheet 2: Runoff curve number and runoff

Project: Goodwives River (MMI# 1581-04-2-4) By: SJB Date: 05/15/09
 Location: Darien & New Canaan Checked: _____ Date: _____
 Circle one: Present Developed Watershed: GR MS-200

1.) Runoff curve number (CN)

Soil Name and Hydrologic Group (Appendix A)	Cover Description (cover type, treatment, and hydrologic condition; percent impervious; unconnected/connected impervious area ratio)	CN Value ^{1.}			Area Acres Sq. Ft. %	Product of CN x Area
		Table 2-2	Figure 2-3	Figure 2-4		
B	Impervious Paved (including ROW)	83			0.96	80.02
B	Residential - 1 acre	61			2.53	154.48
B	Residential - 1/2 acre	64			8.70	556.87
B	Residential - 2 acre	60			3.84	230.17
B	Water	98			0.88	86.13
B	Woods - Good	55			0.36	19.59
D	Residential - 1 acre	80			0.01	1.17
D	Residential - 2 acre	80			1.43	114.73
D	Woods/Grass - Fair	82			0.44	36.47
Totals =					19.16	1,279.63

^{1.} Use only one CN value source per line.

(0.02994 sq mi)

$$\text{CN (weighted)} = \frac{\text{total product}}{\text{total area}} = \frac{1,279.63}{19.16} \text{ Use CN} = \boxed{67}$$