

Supplemental Materials

Supplemental Table 1. Patient characteristics and co-morbidities (Success only)

<i>Feature</i>	<i>Success (analyzed)</i>	<i>Success (not analyzed)</i>	<i>p-value*</i>
Patients	8	10	
Age, mean \pm SD, years	64.3 \pm 8.6	63.5 \pm 5.02	0.62
Male	8 (100)	10 (100)	1.0
Comorbidities			
CAD	3 (37.5)	7 (70)	0.34
CHF	1 (12.5)	0 (0)	0.44
Diabetes	3 (37.5)	3 (30)	1.0
Hypertension	8 (100)	10 (100)	1.0
Dyslipidemia	7 (87.5)	9 (90)	1.0
Renal insufficiency†	0 (0)	0 (0)	1.0
Past/current smoker	8 (100)	10 (100)	1.0
Medications‡			
Aspirin	8 (100)	9 (90)	1.0
Plavix	7 (87.5)	10 (100)	0.44
Warfarin	1 (12.5)	0 (0)	0.44
Aggrenox	1 (12.5)	0 (0)	0.44
Statin	8 (100)	8 (80)	0.48
Cilostazol	3 (37.5)	7 (70)	0.34
Steroids	0 (0)	0 (0)	1.0

Categorical data are shown as number (%) and continuous data as mean \pm standard deviation

CAD, coronary artery disease; CHF, congestive heart failure

* χ^2 or t-test, where appropriate

†Creatinine > 1.8

‡Medications on discharge following procedure

Supplemental Table 2. Patient and procedural characteristics (Success only)

<i>Feature</i>	<i>Success (analyzed)</i>	<i>Success (not analyzed)</i>	<i>p-value*</i>
Preop ABI	0.68 ± 0.15	0.66 ± 0.12	0.8
Postop ABI	1.01 ± 0.05	0.96 ± 0.08	0.17
Indication			
Claudication	6 (75)	8 (80)	
Rest pain	0 (0)	1 (10)	
Tissue loss	2 (25)	1 (10)	0.76
Procedure			
PTA	2 (25)	3 (30)	
PTA+Stenting	6 (75)	7 (70)	1.0
Intervention Site			
SFA	8 (100)	10 (100)	
Popliteal	0 (0)	2 (20)	
Tibial	1 (12.5)	0 (0)	0.32
TASC class			
A	4 (50)	1 (10)	
B	2 (25)	5 (50)	
C	2 (25)	4 (40)	
D	0 (0)	0 (0)	0.24

Categorical data are shown as number (%) and continuous data as mean ± standard deviation
 ABI, ankle-brachial index; PTA, percutaneous transluminal angioplasty; SFA, superficial femoral artery; TASC, TransAtlantic Inter-Society Consensus

*Fisher's exact or t-test, where appropriate

Supplemental Table 3. Patient characteristics and co-morbidities (All)

<i>Feature</i>	<i>All</i>
Patients	24 (100)
Age, mean \pm SD, years	63.3 \pm 6.7
Male	24 (100)
<i>Comorbidities</i>	
CAD	12 (50)
CHF	1 (4.2)
Diabetes	9 (37.5)
Hypertension	24 (100)
Dyslipidemia	22 (91.7)
Renal insufficiency*	0 (0)
Past/current smoker	24 (100)
<i>Medications</i>[†]	
Aspirin	23 (95.8)
Plavix	22 (91.7)
Warfarin	1 (4.2)
Aggrenox	1 (4.2)
Statin	20 (83.3)
Cilostazol	11 (45.8)
Steroids	0 (0)

Categorical data are shown as number (%) and continuous data as mean \pm standard deviation

*Creatinine > 1.8

[†]Medications on discharge following procedure

CAD, coronary artery disease; CHF, congestive heart failure

Supplemental Table 4. Patient and procedural characteristics (All)

<i>Feature</i>	<i>All</i>
Preop ABI	0.66 ± 0.13
Postop ABI	0.96 ± 0.13
Indication	
Claudication	18 (75)
Rest pain	1 (4.2)
Tissue loss	5 (20.8)
Procedure	
PTA	7 (29.2)
PTA+Stenting	17 (70.8)
Intervention Site	
SFA	24 (100)
Popliteal	4 (16.7)
Tibial	2 (8.3)
TASC classification	
A	6 (25)
B	12 (50)
C	6 (25)
D	0 (0)

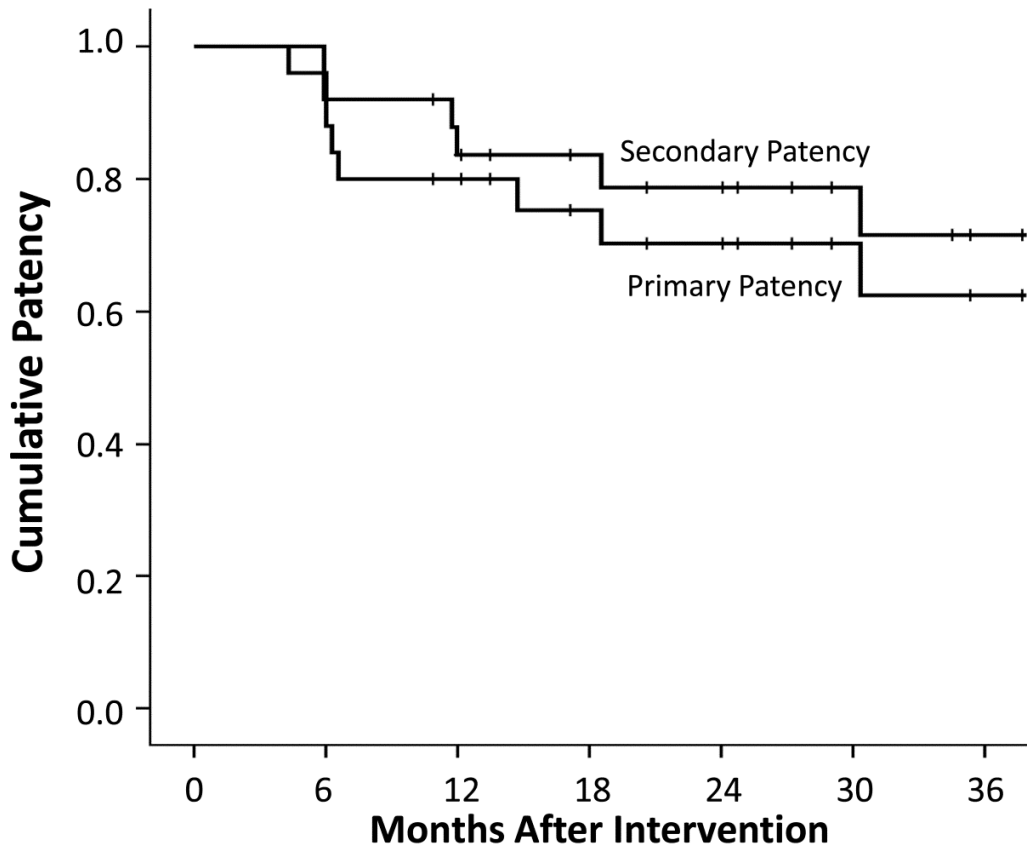
Categorical data are shown as number (%) and continuous data as mean ± standard deviation
ABI, ankle-brachial index; PTA, percutaneous transluminal angioplasty; SFA, superficial femoral artery; TASC, TransAtlantic Inter-Society Consensus

Supplemental Table 5. Summary of class prediction analyses

Timepoint	p	1 Nearest Neighbor		3 Nearest Neighbor	
		Cross Validation (%)	p-value (MCS)	Cross Validation (%)	p-value (MCS)
Pre-op	0.001	42	0.651	50	0.502
2 Hours	0.001	46	0.615	46	0.614
1 Day	0.001	77	0.114	69	0.236
7 Days	0.001	8	0.988	23	0.926
28 Days	0.001	33	0.669	33	0.693

MCS, Monte Carlo Simulation

Supplemental Figure 1

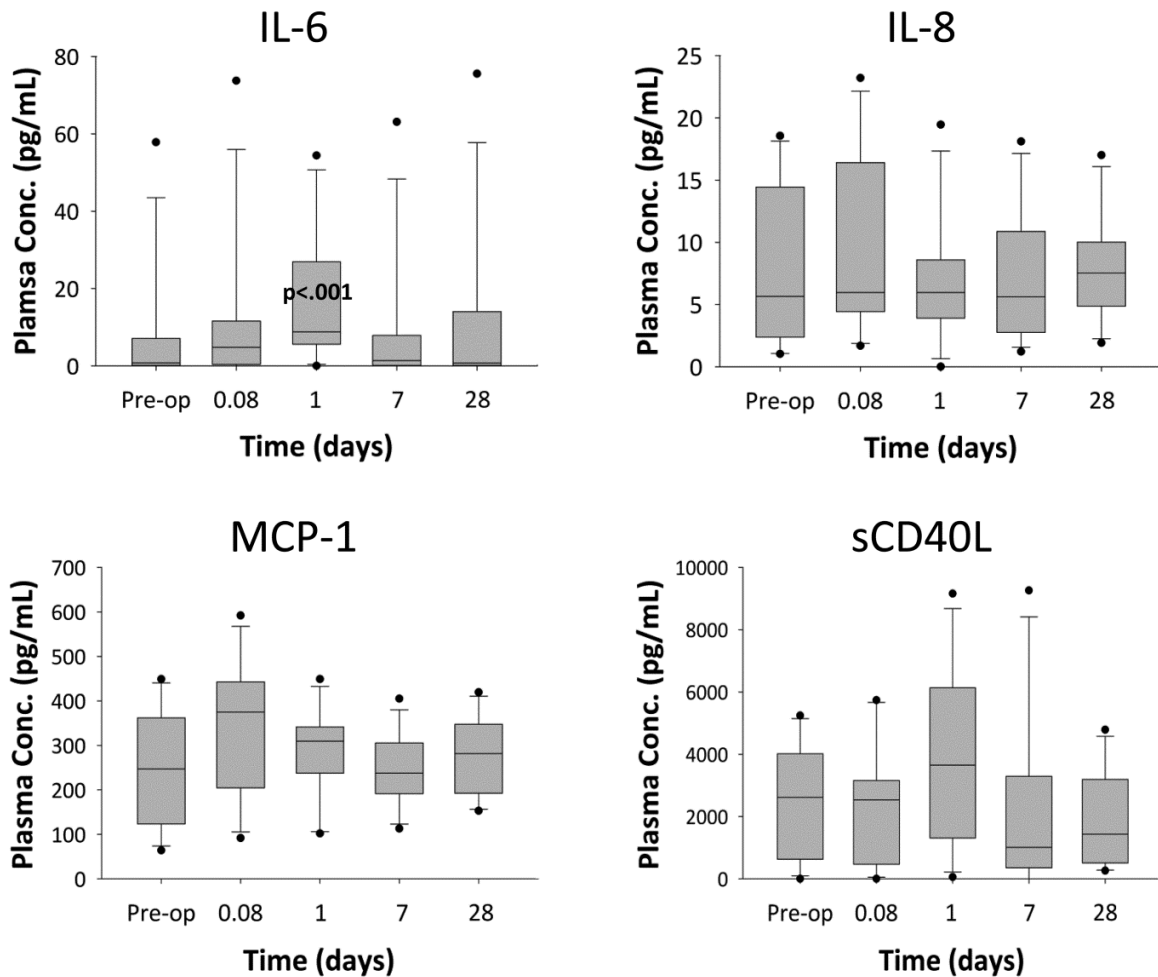


Primary Patency	At Risk	24	21	15	11	8	7	3
	SE	.06	.09	.09	.11	.11	.13	.18
Secondary Patency	At Risk	24	22	16	13	10	8	4
	SE	.04	.08	.08	.10	.10	.12	.18

Supplemental Figure 1. Kaplan Meier estimations of primary and secondary patency.

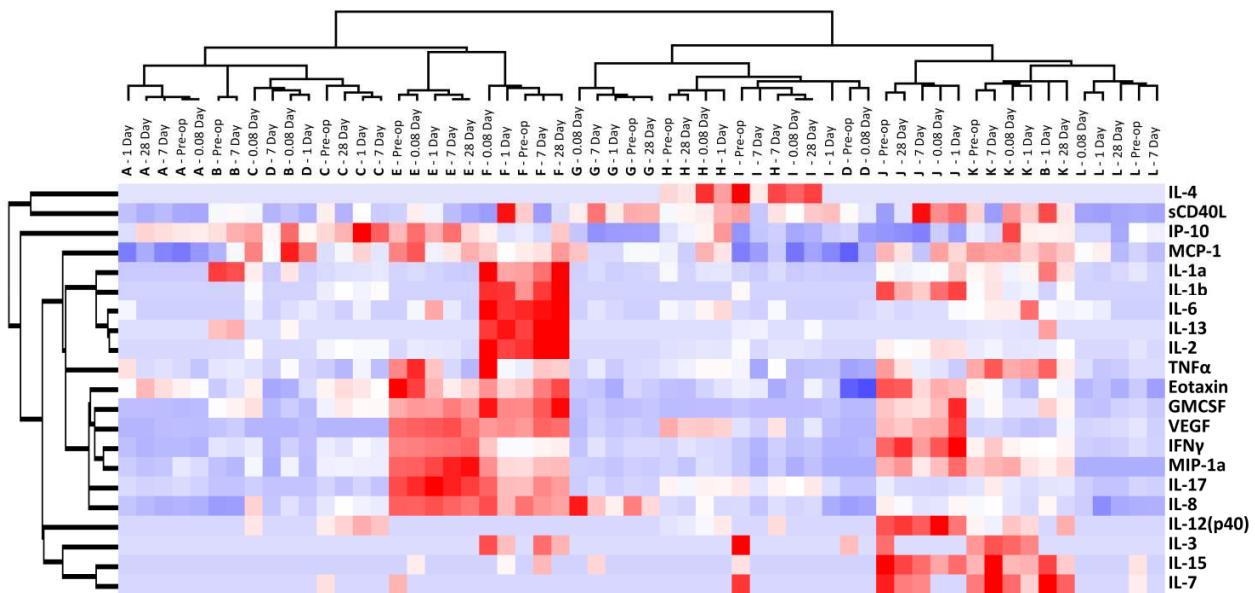
Cumulative one and two year primary patency was 79% and 66%, while one and two year secondary patency was 83% and 76%.

Supplemental Figure 2



Supplemental Figure 2. Plasma inflammatory protein levels following endovascular revascularization. By 24 hours post-intervention, the increase in interleukin-6 (IL-6) concentration ($16.0 \text{ ng/mL} \pm 5.0$) reached the Bonferroni-adjusted significance level compared to preoperative levels ($7.0 \text{ ng/mL} \pm 4.7$, $p = .001$). The plasma concentrations of interleukin 8 (IL-8), monocyte chemoattractant protein-1 (MCP-1), and soluble CD40 ligand (sCD40L) also demonstrated alterations following intervention; however these changes did not reach significance.

Supplemental Figure 3



Supplemental Figure 3. Unsupervised hierarchical clustering analysis of plasma inflammatory protein concentrations. Each patient sample at each time point is displayed across the x-axis, with each patient represented by the letters A through L. The horizontal dendrogram identifies the individual patient's plasma protein signature as the dominant clustering effect. Each patient appears to have a unique inflammatory protein profile that remains relatively constant following endovascular intervention. Red represents up-regulation and blue represents down-regulation.