

SUPPLEMENTAL MATERIAL

Table S1. Deviations from the protocol follow-up window at 30 ± 10 days.

| Variable | Distal (n=150) | Proximal (n=150) |
|--------------------------------|-----------------------|-------------------------|
| Lost to Follow-up | 22 (14.7%) | 24 (16.0%) |
| 30-day Follow-up Window | n=128 | n=126 |
| Median Follow-up Time (days) | 28 [23, 37] | 30 [24, 40] |
| <20 days | 1 (0.8%) | 2 (1.6%) |
| 30 ± 10 days | 104 (81.3%) | 94 (74.6%) |
| >40 days | 23 (18.0%) | 30 (23.8%) |

Values are frequency (%) or median [quartiles].

Table S2. Summary of the mean and standard deviation for Quick DASH, pinch grip, and hand grip change simulated in 1000 Monte Carlo Simulations. A 10% ± 10% reduction was evaluated for each test.

| Scenarios | Mean from 1000 Monte Carlo Simulations | Quick DASH Difference (Post – Pre) | | Pinch Difference (Post – Pre) | | Grip Difference (Post – Pre) | | Average Z- Score | |
|---|---|--|-------|-------------------------------------|-------|------------------------------------|-------|---------------------|-------|
| | | dRA | pRA | dRA | pRA | dRA | pRA | dRA | pRA |
| 1: 10% ± 10% reduction in dRA Hand Grip Strength and 0% ± 10% in all other measures with total n=250 | Mean | -0.19 | -0.19 | 0 | 0.01 | 0 | -4.41 | 0.14 | -0.14 |
| | SD | 3.73 | 3.73 | 0.7 | 0.7 | 4.53 | 4.66 | 0.69 | 0.69 |
| 2: 10% ± 10% reduction in dRA Pinch Grip and 0% ± 10% in all other measures with total n=250 | Mean | -0.19 | -0.19 | 0 | -0.67 | 0 | 0 | 0.14 | -0.14 |
| | SD | 3.73 | 3.73 | 0.70 | 0.71 | 4.53 | 4.53 | 0.69 | 0.69 |
| 3: 10% ± 10% reduction in dRA Quick DASH Score and 0% ± 10% in all other measures with total n=250 | Mean | -0.19 | -3.62 | 0 | 0.01 | 0 | 0 | 0.13 | -0.13 |
| | SD | 3.73 | 4.01 | 0.7 | 0.7 | 4.53 | 4.53 | 0.68 | 0.70 |

DASH - Disabilities of the Arm, Shoulder, and Hand questionnaire; dRA – distal radial artery;
pRA – proximal radial artery

Table S3. Comparison of baseline characteristics between patients included vs. excluded. Patients excluded did not have a follow-up measurement at 30-days.

| Variable | Overall (n=300) | Excluded (n=46) | Included (n=254) | P |
|---|------------------------|------------------------|-------------------------|----------|
| Baseline Patient Characteristics | | | | |
| Age (yrs) | 66.6 ± 9.6 | 63.5 ± 10.3 | 67.2 ± 9.4 | 0.03 |
| Sex | | | | 0.42 |
| <i>Female</i> | 74 (24.7%) | 14 (30.4%) | 60 (23.6%) | |
| <i>Male</i> | 226 (75.3%) | 32 (69.6%) | 194 (76.4%) | |
| Diabetes Mellitus | 96 (32%) | 14 (30.4%) | 82 (32.3%) | 0.94 |
| Hypercholesteremia | 56 (18.7%) | 4 (8.7%) | 52 (20.5%) | 0.09 |
| Hypertension | 232 (77.3%) | 37 (80.4%) | 195 (76.8%) | 0.72 |
| Prior Myocardial Infarction | 39 (13%) | 9 (19.6%) | 30 (11.8%) | 0.23 |
| Prior CABG | 6 (2%) | 1 (2.2%) | 5 (2%) | 1 |
| Prior PCI | 56 (18.7%) | 6 (13%) | 50 (19.7%) | 0.39 |
| Baseline Hand Function | | | | |
| Hand Grip (kg) | | | | |
| <i>Left Hand</i> | 21.2 [15.6, 28.7] | 21.3 [15.5, 28.7] | 20.8 [15.8, 28.5] | 0.72 |
| <i>Right Hand</i> | 26 [18.7, 32.8] | 27.3 [17.9, 33.8] | 25.5 [18.7, 32.7] | 0.58 |
| Pinch Grip (kg) | | | | |
| <i>Left Hand</i> | 6.8 [5.1, 8.4] | 7.3 [5.1, 9.1] | 6.8 [5, 8.2] | 0.17 |
| <i>Right Hand</i> | 7.3 [5.4, 9] | 7.7 [5.7, 9.1] | 7.3 [5.3, 8.8] | 0.31 |
| Quick DASH | | | | |
| Score | 4.6 [0, 15.9] | 6.8 [0, 15.9] | 4.6 [0, 13.6] | 0.97 |

Values are frequency (%), mean ± standard deviation, or median [quartiles].

CABG – coronary artery bypass graft; DASH - Disabilities of the Arm, Shoulder, and Hand questionnaire; kg – kilogram; PCI – percutaneous coronary intervention

Table S4. Hand and pinch grip strength at 30-days in the non-catheterization hand.

| Variable | Overall (n=254) | Distal (n=128) | Proximal (n=126) | P |
|---------------------------------|----------------------------|---------------------------|-----------------------------|----------|
| Hand Grip Strength (kg) | | | | |
| <i>Baseline</i> | 20.8 [16, 28.5] | 21.5 [16, 28] | 20.3 [16, 28.7] | 0.51 |
| <i>30-days</i> | 24 [17.1, 31.8] | 26 [17, 33] | 23.3 [17.3, 30.7] | 0.35 |
| <i>Change from Baseline*</i> | 2.5 [-1.3, 6.7] | 2.7 [-1.3, 7.3] | 2 [-1.3, 5.3] | 0.49 |
| Pinch Grip Strength (kg) | | | | |
| <i>Baseline</i> | 6.8 [5, 8.2] | 7 [5, 8.3] | 6.4 [5, 8] | 0.28 |
| <i>30-days</i> | 6.6 [4.8, 8.2] | 6.7 [4.8, 8.2] | 6.3 [4.8, 8.2] | 0.98 |
| <i>Change from Baseline*</i> | 0 [-1, 0.9] | -0.1 [-1, 0.6] | 0 [-1, 0.9] | 0.2 |

Values are median [quartiles].

kg – kilogram

* Hand Grip and Pinch Grip Change were calculated as 30-days – baseline such that negative values indicate worsening.