TABLE E-1 Details of All Ruptures (All Control Patients). Patient Time to Cause and Course Number Rupture (weeks) 1.2 Infection with B. cereus detected four days postoperatively. Treated with antibiotics and irrigation with repair of rupture two weeks later. Persistent infection led to amputation eight weeks after primary procedure. 6 Patient compliant with therapy but rupture occurred during therapy with active flexion. Rupture repaired two weeks later. Patient non-compliant with therapy. Rupture repaired on same day. Patient non-compliant with therapy and missed visits between six and twelve weeks. No secondary procedure 12 performed. Functional PIP contracture. 5 Patient compliant with therapy. Rupture repaired two weeks later. Patient compliant with therapy. Rupture treated six weeks later with tenolysis and flexor tendon grafting. 12 Multiple digit injury (ring, small). Patient non-compliant with therapy. Repair of ring finger ruptured and was repaired two days later. Repair of small digit remained intact. Multiple digit injury (long, ring). Patient non-compliant with therapy. Repair of long finger ruptured and was repaired one day later. Repair of ring finger remained intact. 1.5 Multiple digit injury (index, long). Patient presented on postoperative day eleven with infection and rupture of repair of index finger. Treated with antibiotics and irrigation three days later. Patient was non-compliant with

therapy and rupture was not repaired.

TABLE E-2 Course of Infections in the Four Patients in the Control Group and Three Patients in the Teno Fix Group. Patient Repair Method Course of Infection Number Control Wound infection four days after primary repair unresponsive to antibiotic treatment and multiple débridements leading to rupture of repair. Eventual hand infection resulting in digit amputation. Control Acute postoperative wound infection one week after repair of rupture. Resolved with débridement and antibiotic therapy eight days later. Acute postoperative wound infection one month after secondary repair with Stage I tendon 6 Control grafting. Resolved fourteen days later with antibiotic therapy. 9 Control Wound infection of index finger and long finger in multiple digit repair. Infection developed in index finger eleven days after primary repair. It required two months of treatment to resolve. Infection developed in long finger six weeks after primary repair. It resolved in two weeks with antibiotic treatment. 10 Teno Fix Cellulitis (S. aureus) nine days after primary repair. Resolved with three days of antibiotic therapy. The device was removed four months later secondary to migration. Three days after device removal, a wound infection developed that resolved twelve days later with débridement and antibiotic therapy. 11 Teno Fix Infection of a necrotic skin flap three weeks after primary repair. Area was débrided and a skin flap was created, with no subsequent evidence of infection after seven days. 12 Teno Fix Wound infection of small-finger repair fifteen days after primary multiple digit repair. It resolved

five days later with antibiotic treatment and suture removal.