**Supplement Table 1:** Baseline patient characteristics in all patients

|  |  |  |
| --- | --- | --- |
|  | **Early Capsule (N=42)** | **Standard of Care (N=45)** |
| **Male, n (%)** | 23 (54.7) | 28 (62.2) |
| **Age (years), mean ± SD** | 70.0 ± 12.6 | 70.4 ± 16.4 |
| **Vital signs at admission, mean ± SD** |  |  |
| **Heart rate at admission (beats per**  **minute)** | 77.7 ± 13.2 | 82.9 ± 15.4 |
| **Systolic blood pressure at admission**  **(mm Hg)** | 124.4 ± 21.9 | 125.3 ± 21.4 |
| **History of heart failure, n (%)** | 1 (2.4) | 8 (17.8) |
| **History of cirrhosis, n (%)** | 4 (9.5) | 4 (8.9) |
| **Recent syncope, n (%)** | 4 (9.5) | 2 (4.5) |
| **Glasgow-Blatchford Score, mean ± SD** | 8.4 ± 4.2 | 9.7 ± 3.7 |
| **Laboratory data at admission, mean ± SD** |  |  |
| **Blood urea nitrogen (mmol/L)** | 1.7 ± 1.3 | 1.9 ± 1.3 |
| **Prothrombin time (seconds)** | 15.3 ± 9.5 | 15.8 ± 11.4 |
| **Hemoglobin (g/dL)** | 9.4 ± 3.0 | 9.1 ± 2.1 |
| **Type of bleeding at admission, n (%)** |  |  |
| **Melena** | 25 (59.5) | 34 (75.6) |
| **Hematochezia** | 11 (26.1) | 9 (20.0) |
| **Symptomatic anemia** | 6 (14.2) | 2 (4.4) |
| **Re bleeding at 3 days, n (%)** | 0 (0.0) | 0 (0.0) |
| **Re bleeding at 30 days, n (%)** | 0 (0.0) | 4 (8.9) |
| **Death** | 1 (2.4)\* | 2 (4.4)\* |
| **Number of patients requiring ICU care** | 10 (23.8%)# | 7 (15.6)# |

\*All deaths were unrelated to procedure;

# ICU level care occurred after patients were admitted to the floor

**Supplement Table 2:** Cost Variables with Contributing Percentages

|  |  |  |  |
| --- | --- | --- | --- |
|  | **Early Capsule** | **Standard of Care** | **Cumulative** |
|  |  |  |  |
| **Room and Board (%)** | 26 | 36 | 32 |
| **Intensive Care (%)** | 20 | 11 | 15 |
| **Emergency Room (%)** | 14 | 12 | 13 |
| **Gastrointestinal (%)** | 10 | 14 | 12 |
| **Observation room (%)** | 6 | 5 | 5 |
| **Supplies (%)** | 3 | 5 | 4 |
| **Laboratory (%)** | 3 | 4 | 4 |
| **Imaging (%)** | 3 | 2 | 3 |
| **Blood (%)** | 3 | 2 | 2 |
| **Pharmacy (%)** | 2 | 2 | 2 |
| **Therapies (%)** | 3 | 1 | 2 |
| **Anesthesia (%)** | 1 | 1 | 1 |
| **Intravenous therapy (%)** | 1 | 1 | 1 |
| **Tests (%)** | 1 | 1 | 1 |
| **Recovery Room (%)** | 1 | 0 | 1 |
| **Pulmonary Function (%)** | 0 | 0 | 0 |
| **Respiratory (%)** | 0 | 1 | 0 |
| **Clinic (%)** | 1 | 0 | 0 |
| **Operating Room services (%)** | 1 | 0 | 0 |
| **Other (%)** | 0 | 0 | 0 |
| **Total** | 100 | 100 | 100 |

**Supplement Table 3: Etiologic Diagnosis in Both Groups**

|  |  |  |
| --- | --- | --- |
|  | Early Capsule  (n = 42) | Standard of Care  (n = 45) |
| Foregut lesions, n (total %) |  |  |
| Esophageal ulcer | 1 (2.4) | 1 (2.2) |
| Gastroduodenal ulcer | 7 (16.7) | 12 (26.7) |
| Gastropathy/duodenopathy | 4 (9.5) | 0 (0.0) |
| Gastric angioectasia | 1 (2.4) | 0 (0.0) |
| Duodenal Dieulafoy lesion | 0 (0.0) | 1 (2.2) |
| Duodenal angioectasia | 2 (4.8) | 1 (2.2) |
| Midgut lesions, n(total %) |  |  |
| Small bowel angioectasia | 3 (7.1) | 0 (0.0) |
| Colorectal lesions, n(total %) |  |  |
| Diverticulosis | 7 (16.7) | 2 (4.4) |
| Colonic angioectasia | 2 (4.8) | 0 (0.0) |
| Dieulafoy lesion | 1 (2.4) | 0 (0.0) |
| Cecal ulcer | 1 (2.4) | 1 (2.2) |
| Colorectal cancer | 0 (0.0) | 2 (4.4) |
| Internal hemorrhoids | 0 (0.0) | 1 (2.2) |
| Ischemic colitis | 1 (2.4) | 0 (0.0) |
| No diagnosis, n (%) | 12 (28.6) | 24 (53.3) |
|  |  |  |

Etiologic diagnoses of patients in each cohort. Of note, 27 and 3 patients in the EC group were found to have a diagnosis based on subsequent endoscopy performed during and after hospitalization, respectively. Although, there were 14 patients who were found to have bleeding in the SOC, 21 patients were determined to have a presumed diagnosis (as seen in this table). However, only 12 of these lesions were determined to be culprit lesions. Please see Phase one of our study for detailed discussion regarding presumed versus definitive diagnosis.

**Supplement Figure 1:** Flow Diagram of Patient Enrollment

206 patients screened

**119 excluded patients:**

DNR/DNI=21 patients

Suspected hemorrhoidal bleeding=13 patients

Previous evaluation for bleeding= 13 patients

Hemodynamically unstable= 13 patients

Could not provide informed consent=10 patients

Prior intestinal surgery=9 patients

Declined participation= 9 patients

Dysphagia= 8 patients

Hematemesis on presentation= 5 patients

Suspected infectious colitis= 3 patients

Implanted medical device=3 patients

History of bowel obstruction= 3 patients

Severe abdominal pain= 1 patient

History of Crohns disease= 1 patients

87 patients randomized

45 patients in Standard of Care Arm (SOC)

42 patients in Early Capsule Arm (EC)

Phase 1 Analysis

2 outliers excluded 2 outliers excluded

1 with limited information

43 patients in Standard of Care Arm (SOC)

39 patients in Early Capsule Arm (EC)

Phase 2 Analysis