

Journal Watch

A Phase II Trial of Triamcinolone Hexacetonide for Symptomatic Recurrent Malignant Ascites

Reference: John R. Mackey, MD, Lori Wood, MD, Jean-Marc Nabholz, MD, MSc, John Jensen, MD, and Peter Venner, MD

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Abstract: JPSM Vol. 19 No. 3 March 2000

Ascites is a common complication of advanced cancer and frequently requires paracentesis to reduce symptoms of pain, anorexia, and dyspnea. For many patients repeat paracenteses are required at short intervals. We prospectively studied 15 patients with recurrent ascites of malignancy to determine if intraperitoneal triamcinolone hexacetonide, a slowly metabolized corticosteroid, produced objective and symptomatic responses. After biochemical, radiological, and symptom assessment and the establishment of the interval between paracenteses, patients underwent large-volume paracentesis followed by intraperitoneal triamcinolone hexacetonide 10 mg/kg. Patients were followed after treatment for assessment of symptoms and physical signs of ascites. Repeat paracentesis was performed when symptomatic ascites recurred. Symptomatic ascites recurred in 13 of 15 patients, but the interval between paracenteses was extended from 9.5 +/- 1.6 days to 17.5 days (P=0.0086). Symptom questionnaire scores assessing well-being, nausea, abdominal pain, dyspnea, appetite, appearance, and change in abdominal size on a scale from 0 to 6 averaged 3.2 +/- 0.3 at entry and 2.5 +/- 0.2 at the 2-week assessment (P=0.026). Self-assessed symptoms, feeling of well-being, abdominal distention, and physical appearance improved significantly. The mean serum cortisol decreased from baseline, suggesting that some systemic corticosteroid absorption occurred. Thirteen of 15 patients have died, with a median survival of 42 days. Potential adverse effects included 1 episode each of transient abdominal pain, bacterial peritonitis, and localized herpes zoster infection. In patients with ascites of malignancy, intraperitoneal triamcinolone hexacetonide appears to postpone the requirement for repeat paracentesis and improve symptoms of malignant ascites.

Strengths:

- Canadian study done at Cross Cancer Institute in Edmonton by a local Oncologist.
- Rigorous physical, biochemical and symptomatic assessments.
- Comprehensive data disclosure: patient demographics (site of primary, presence of liver metastases, SAAG < 11, ascites cytology), exclusion criteria, procedural methods and parameters (mean dose of triamcinolone used, mean volume of ascetic fluid withdrawn) symptom scores, physical and biochemical measures pre and post paracentesis (weight, abdominal girth, random cortisol, SAAG, ascites cytology) as well as follow up and survival parameters.
- Disclosure of adverse effects.
- Good discussion on possible mechanism of action of triamcinolone.

Weaknesses:

- Small number of patients.
- Prospective analysis.
- No control group.
- Symptom assessment scale used was not provided, unsure whether it has been validated.

Further studies in the setting of a controlled clinical trial are warranted.

Relevance to Palliative Care:

Malignant ascites is a common symptom with significant burden and an indicator of poor prognosis. Current therapeutic options are marginally helpful with short lived effect. Interventional options have significant associated complications. Therapeutic paracentesis is effective but repeat drainages are often required. Patient population that is similar to ours: had poor prognosis, no systemic therapeutic options

remaining, at least one prior paracentesis performed for symptomatic ascites, exclusion of hematological malignancies, high functioning (ECOG<2). Simple procedure with few medical resources required. This procedure can be done in most centers with little prior technical expertise required. Little post procedure monitoring required and modest associated toxicities is reported. Significant improvement in symptoms, physical markers and recurrence interval were reported.