In March 2006, Andrea G, a 23 year old white nul-
liparous woman who was 17 weeks pregnant, was
referred to her local neurology department. She
had been experiencing hypoaesthesia of the right leg
for seven days and of the left leg for two days. Since
the previous day she had also been experiencing a
focal weakness of the left leg and an inability to void
her bladder adequately.

One month earlier she had experienced back
pain, which was relieved by physiotherapy. For the past
14 days, she had again been experiencing lumbar pain
and pain of the left shoulder. Cardiopulmonary and
abdominal examinations showed no abnormality,
and her body temperature was within the normal
range. She had a hypotonic paraparesis of the legs
accentuated on the left side, with bilaterally exagger-
ated tendon reflexes, non-sustained cloniform Achil-
les’ tendon reflexes, and a normal plantar reflex. Her
pain and temperature sensations were diminished on
the right from T8 dermatome distally; vibration and
position sensation were normal. Anal sphincter tone
was normal. She had no meningism. Her mood was
slightly depressed.

Urine culture showed urinary tract infection with
Escherichia coli and Klebsiella pneumoniae. Cerebrospi-
nal fluid analysis showed no evidence of infection (table).
Visual evoked potentials were normal.

QUESTIONS

1. What diagnoses might explain the patient’s presentation
and the neurological abnormalities that were found?
2. What could account for her magnetic resonance imaging
results?
3. What additional diagnostic tests would you suggest?
4. Could pregnancy have a role in her symptoms?

Please respond through bmj.com, remembering that the
patient is real and that she and her carers will read the
response.

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INTERACTIVE CASE REPORT

A woman with acute myelopathy in pregnancy:
case presentation

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Urine culture showed urinary tract infection with
Escherichia coli and Klebsiella pneumoniae. Cerebrospi-
nal fluid analysis showed no evidence of infection (table). Visual evoked potentials were normal.
T2 weighted magnetic resonance imaging (MRI) of the spinal cord showed central symmetric lesions spanning from cervical level 7 (C7) to T8, enhancing between T2 and T7 (figure), and excluded a compressive cause. Cranial MRI in the emergency department had indicated vascular malformation as the reason for her clinical symptoms, but spinal angiography showed no evidence of vascular malformation or occlusion as other non-compressive causes of acute myelopathy. Although fetal organogenesis was complete, Mrs G consented to termination of the pregnancy on medical grounds after being counselled about the risk to the fetus from the high x ray load of procedures such as spinal angiography and use of contrast agent.

We thank A Bock for providing the figure.

Competing interests: None declared.

Patient consent obtained.

Provenance and peer review: Not commissioned; externally peer reviewed.

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Results of Mrs G’s cerebral spinal fluid and serum analysis at presentation

<table>
<thead>
<tr>
<th>Test</th>
<th>Result</th>
<th>Normal range</th>
</tr>
</thead>
<tbody>
<tr>
<td>Cerebral spinal fluid</td>
<td></td>
<td></td>
</tr>
<tr>
<td>Total cell count (×10⁶/l)</td>
<td>7</td>
<td>&lt;5</td>
</tr>
<tr>
<td>Differential cell count (%)</td>
<td></td>
<td></td>
</tr>
<tr>
<td>Lymphocytes:</td>
<td>61</td>
<td>60-70</td>
</tr>
<tr>
<td>Activated</td>
<td>3</td>
<td>0</td>
</tr>
<tr>
<td>Monocytes:</td>
<td>5</td>
<td>30-50</td>
</tr>
<tr>
<td>Activated</td>
<td>3</td>
<td>0</td>
</tr>
<tr>
<td>Segmented granulocytes</td>
<td>27</td>
<td>0-3</td>
</tr>
<tr>
<td>Eosinophilic granulocytes</td>
<td>1</td>
<td>Rarely detected</td>
</tr>
<tr>
<td>Erythrocytes</td>
<td>0</td>
<td>0</td>
</tr>
<tr>
<td>Total protein (mg/l)</td>
<td>520</td>
<td>150-450</td>
</tr>
<tr>
<td>IgG synthesis</td>
<td>Negative</td>
<td>Negative</td>
</tr>
<tr>
<td>IgM synthesis</td>
<td>Negative</td>
<td>Negative</td>
</tr>
<tr>
<td>IgA synthesis</td>
<td>Negative</td>
<td>Negative</td>
</tr>
<tr>
<td>Glucose (mmol/l)</td>
<td>3.0</td>
<td>2.5-3.9</td>
</tr>
<tr>
<td>Lactate (mmol/l)</td>
<td>2.7</td>
<td>1.2-2.1</td>
</tr>
<tr>
<td>Serum</td>
<td></td>
<td></td>
</tr>
<tr>
<td>Leucocytes (×10⁹/l)</td>
<td>17.8</td>
<td>4.3-10.0</td>
</tr>
<tr>
<td>C reactive protein (mg/l)</td>
<td>10.1</td>
<td>&lt;5</td>
</tr>
<tr>
<td>Alanine aminotransferase (U/l)</td>
<td>0.61</td>
<td>0-23</td>
</tr>
<tr>
<td>Total protein (g/l)</td>
<td>57.9</td>
<td>55-80</td>
</tr>
</tbody>
</table>

Colonic carcinoma presenting as repeated episodes of enterobacter septicaemia during induction of remission in acute myeloblastic leukaemia

Bassam Odeh,1 David Bareford2

During neutropenic episodes, recurrent septicaemia with gut bacteria should prompt suspicion of underlying gut pathology.

Patients undergoing curative treatment for acute leukaemia receive several cycles of combination chemotherapy using intravenous cytotoxic drugs given through central venous catheters. As a side effect, each period of treatment is followed by a pancytopenic phase lasting between two and four weeks, when haemoglobin, white cells, and platelets reach very low levels. During this period transfusions of blood and platelets are needed. If the patient becomes pyrexial (neutropenic fever) blood cultures are taken and broad spectrum antibiotics are started while awaiting specific identification of the cultured organism and its sensitivity to antibiotics. Over the past two decades the most common organisms isolated have been Gram positive bacteria, often in relation to the use of central venous catheters.1 Staphylococcus epidermidis is frequently isolated and responds to vancomycin or teicoplanin. Repeated isolation of Gram positive organisms in blood culture often leads to removal of the central line with resolution of the problem. Repeated blood cultures positive for Gram negative organisms are very rare. We report a case in which repeated isolation of a Gram negative organism commonly found in the large bowel eventually led to the identification of a colonic neoplasm.

Case report

A white man aged 60 presented to his general practitioner with tiredness and lethargy. A full blood count indicated acute myeloid leukaemia with a haemoglobin level of 55 g/l, white blood cell count of 8×10⁹/l, platelet count 35×10⁹/l, and a peripheral blood film showing the presence of myeloblasts. He was promptly admitted for further investigation and treatment.

His symptoms on admission were feeling unwell and profoundly tired. He had also noted a small fine rash on his legs. He had occasionally noted recent small amounts of rectal bleeding but on direct questioning reported no constipation, melaena, or change in his bowel habit.

On examination the patient was pale, apyrexial, and normotensive. Lymphadenopathy and organomegaly were not present but petechiae were noted on both legs.

Results of liver and renal function tests, lactate dehydrogenase, and coagulation screen were normal. Bone...