

```

module BoundedBuffer
  op deposit(typeT), fetch(result typeT);
body
  process Buffer {
    typeT buf[n];
    int front = 0, rear = 0, count = 0;
    while (true)
      in deposit(item) and count < n ->
        buf[rear] = item;
        rear = (rear+1) mod n; count = count+1;
      [] fetch(item) and count > 0 ->
        item = buf[front];
        front = (front+1) mod n; count = count-1;
    ni
  }
end BoundedBuffer

```

**Figure 8.5** Rendezvous implementation of a bounded buffer.