NATIONAL INSTITUTE FOR HEALTH AND CLINICAL EXCELLENCE

Single Technology Appraisal

Pazopanib for the second-line treatment of advanced and/or metastatic renal cell carcinoma

Draft scope

Final remit/appraisal objective

To appraise the clinical and cost effectiveness of pazopanib within its licensed indication for the second-line treatment of advanced and/or metastatic renal cell carcinoma.

Background

Renal cell carcinoma (RCC), also called renal adenocarcinoma or hypernephroma, is a cancer usually originating in the lining of the tubules of the kidney. The stage of RCC is usually reported using the tumour, node and metastasis (TMN) classification. This is based on the extent of the primary tumour (T), whether lymph nodes are affected (N) and whether metastases are present (M). Advanced and metastatic RCC fall within stages III and IV, stage III denotes disease that is locally advanced and/or has spread to regional lymph nodes and stage IV denotes that distant metastasis has occurred.

Early, small RCC tumours are usually asymptomatic; the diagnosis of early RCC is usually incidental after abdominal scans for other indications. The most common presenting symptoms of advanced RCC are blood in the urine (haematuria), a palpable mass in the flank or abdomen and abdominal pain. Others non-specific symptoms include fever, night sweats, malaise and weight loss.

Kidney cancer accounts for around 2% of all cancers in the UK. In 2006, 6,906 new kidney cancers were diagnosed in England and Wales, of which an estimated 85 - 90% were RCC. RCC is nearly twice as common in men, than in women, and most commonly affects adults aged 50-80 years old. In 2007, there were 3,257 registered deaths from kidney cancer in England and Wales.

Approximately 25% of people with RCC present with advanced and/or metastatic disease (stage III or IV). An estimated 50% of patients who have curative resection for earlier stages will develop recurrent and/or metastatic disease. Without treatment, these patients have a median survival rate of only 6-12 months and a two-year survival rate of 10-20%.

Surgical resection to remove the entire kidney (radical nephrectomy) or part of the kidney (partial nephrectomy) is the only accepted curative treatment for patients with non metastatic RCC (TNM stage I –III), and the success of surgery depends on the stage of disease. Current NICE guidance

recommends sunitinib as a first-line treatment for people with advanced and/or metastatic RCC for whom immunotherapy is suitable and have an Eastern Cooperative Oncology Group status of 0 or 1 (technology appraisal 169). Sunitinib or sorafenib are not recommended as second-line treatment options for advanced and/or metastatic RCC (technology appraisal 178).

The technology

Pazopanib hydrochloride (GlaxoSmithKline) is an oral multi-targeted kinase receptor inhibitor with anti-tumour activity. Pazopanib inhibits vascular endothelial growth factor receptor (VEGFR) -1, -2 and -3, platelet-derived growth factor receptor (PDGFR), and c-kit, which may result in inhibition of angiogenesis in tumours in which these receptors are upregulated.

Pazopanib does not have a UK marketing authorisation for the treatment of RCC. Pazopanib is currently being studied in clinical trials compared with placebo. The trials include people with locally advanced and/or metastatic RCC who have either received no prior systemic therapy or have received only one prior cytokine-based treatment; or whose disease is refractory to cytokine-based treatment.

Intervention(s)	Pazopanib
Population(s)	People with locally advanced and/or metastatic clear-cell renal cell carcinoma who have received only one prior cytokine based treatment.
Comparators	Best supportive care
Outcomes	The outcome measures to be considered include: • overall survival • progression free survival • response rates • adverse effects of treatment • health-related quality of life.
Economic analysis	The reference case stipulates that the cost effectiveness of treatments should be expressed in terms of incremental cost per quality-adjusted life year. The reference case stipulates that the time horizon for estimating clinical and cost effectiveness should be sufficiently long to reflect any differences in costs or outcomes between the technologies being compared. Costs will be considered from an NHS and Personal Social Services perspective.

Other considerations	If evidence allows the following subgroups will be considered. These include: resected versus unresected primary tumour and prior cytokine-based therapy Guidance will only be issued in accordance with the marketing authorisation
Related NICE recommendations	Related Technology Appraisals: Technology Appraisal No. 169, March 2009, Sunitinib for the first-line treatment of advanced and/or metastatic renal cell carcinoma. Expected date of review February 2011. Technology Appraisal No. 178, August 2009, Bevacizumab (first-line), sorafenib (first- and second-line), sunitinib (second-line) and temsirolimus (first-line) for the treatment of advanced and/or metastatic renal cell carcinoma. Expected date of review June 2011. Technology appraisals in preparation: 'Pazopanib for the first-line treatment of advanced and/or metastatic renal cell carcinoma'. Earliest anticipated date of publication December 2010. 'Everolimus for the second-line treatment of advanced and/or metastatic renal cell carcinoma' Earliest anticipated date of publication June 2010. Related Interventional Procedures: Interventional Procedure No. 344, January 2007, 'Cryotherapy for renal cancers' NICE Interventional Procedure Guidance No. 91, September 2004, 'Percutaneous radiofrequency ablation of renal cancer' Related Cancer Service Guidance: NICE Cancer service guidelines CSG, September 2002, 'Improving outcomes in urological cancer'

Questions for consultation

Are there any other appropriate comparators for the second-line treatment of advanced and/or metastatic renal cell carcinoma that should be included in the scope?

How should best supportive care be defined?

Are there any subgroups of patients in whom the technology is expected to be more clinically effective and cost effective or other groups that should be examined separately?

Are there any issues that require special attention in light of the duty to have due regard to the need to eliminate unlawful discrimination and promote equality?

Is the population defined appropriately?