Reviewer’s report

Title: PR-104 combined with gemcitabine or docetaxel in a phase Ib study of patients with advanced solid tumours

Version: 2 Date: 4 September 2012

Reviewer: James Cleary

Reviewer's report:

Major Compulsory Revisions:

1. Please better describe the mechanism of action of PR-104 in hypoxic conditions. I needed to look up the mechanism in some of the referenced papers.

2. Please also emphasize that PR-104 has activity in both hypoxic and non-hypoxic conditions. Some cell lines can activate PR-104A in the presence of oxygen because of aldoketoreductase 1C3. The function of aldoketoreductase 1C3 was mentioned in introduction but it was not clear that it allows PR-104 to act in oxygenated conditions. The ability of PR-104 to act in oxygenated conditions is important because a major toxicity of this drug is myelosuppression.

3. In methods, please fix “prior high-dose chemotherapy. " I think they are referring to prior stem cell transplant.

4. Please specify the dosages that were tested of PR-104. What was the starting dose?

5. It is important to know whether the patients had been exposed to standard chemotherapy agent they were given (i.e. were they gemcitabine or docetaxel naive). This information greatly affects how we view the response data.

6. Need to discuss FMISO in more detail in either introduction or results section. This is a technique that many readers will not be familiar with.

Discretionary revision

1. Please include a description of the mechanism of action of PR-104 in the title or abstract.

Level of interest: An article whose findings are important to those with closely related research interests

Quality of written English: Acceptable

Statistical review: No, the manuscript does not need to be seen by a statistician.
Declaration of competing interests:

I declare that I have no competing interests