**Problem Solving Task Evaluation Sheet**

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| Name of the Problem: |  |
| Source: |  |

**Note: All submissions must acknowledge the original author and source from which it was taken for copyright purposes.**

What mathematical content ***could be*** investigated with this problem? If possible, include year level and Australian Curriculum codes for the main concepts.

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| **Content Description** | **Year Level** | **AC Reference** |
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What year levels is it appropriate for? How would you rate the difficulty for each year level?

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| **Year Level(s)** | **Difficulty Rating** | | | **How long to complete (on average)** |
|  | H | M | L |  |
|  | H | M | L |  |
|  | H | M | L |  |
|  | H | M | L |  |
|  | H | M | L |  |

How well does the problem address the following criteria?

|  |  |  |  |  |
| --- | --- | --- | --- | --- |
| Has important, useful mathematics embedded in it | H | M | L | Not evident |
| Requires higher-level thinking and problem solving | H | M | L | Not evident |
| Contributes to the conceptual development of students | H | M | L | Not evident |
| Creates an opportunity for the teacher to assess what students are learning and where they are experiencing difficulty | H | M | L | Not evident |
|  | | | | |
| Can be approached in multiple ways using different solution strategies | H | M | L | Not evident |
| Has various solutions or allows different decisions or positions to be taken and defended | H | M | L | Not evident |
| Encourages student engagement and discourse | H | M | L | Not evident |
| Connects to other important mathematical ideas | H | M | L | Not evident |
| Promotes the skillful use of mathematics | H | M | L | Not evident |
| Promotes an opportunity to practice important skills | H | M | L | Not evident |

(source: <http://old.nctm.org/uploadedFiles/Research_News_and_Advocacy/Research/Clips_and_Briefs/Research_brief_14_-_Problem_Solving.pdf> )

**Scaffolding and Fading**

How well structured is the problem in its current form?

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| --- | --- | --- | --- |
| Very well structured | Needs some improvement in clarity | Needs additional scaffolding steps to be included | Requires considerable re-writing |

**Implementation in the Classroom**

What hints, resources and other activities would be useful to have available to assist students in solving the problem? Consider the ways in which the problem can be presented or adapted to cater for differentiation appropriate to different student abilities and needs.

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What Problem Solving Strategies can the task allow students to tap into?

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**Assessment**

Does the task currently have marking scheme or rubric? Yes/No

Do you agree with it? Yes/No

How would you assess the task? Consider whether your “assessment” is formal or informal, end-point or formative.

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What indicators or behaviours would demonstrate that students are not just applying known or previously learned approaches to the task but are actively constructing new understanding?

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**Reviewer Information**

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| **Name** | **School** | **Year levels taught** |
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