

# Wisconsin Future Problem Solving

Problem: \_\_\_\_\_

Topic: \_\_\_\_\_

Evaluator: \_\_\_\_\_

Team Code: \_\_\_\_\_

## Step 1 Scoring Guidelines

**LOW** **High**

**Fluency** – A Yes challenge is a logical cause or effect of the situation in the Future Scene

Fluency is determined by totaling the number of Relevant challenges.

Number of Relevant challenges: 1 2 3 4 5 6 7 8 9 10 11 12 13 14 15 16

**Flexibility** – Measures the number of different categories in Yes challenges

Flexibility is determined by awarding one point per different category used.

Number of categories used: 1 2 3 4 5 6 7 8 9 10 11 12 13 14 15 16

**Clarity** – Tells what the concern is, why it is a concern, and relates to the Future Scene

Hard to determine what challenge is; cause-effect reasoning may be absent or incorrect

1 2 3

Most convey basic idea, but lack detail; cause-effect reasoning vague or takes leap

4 5 6

Clear explanations; some detail; most cause-effect relationships make sense

7 8

Well written; clear descriptions with detail; logical cause-effect relationships

9 10

**Originality** – Three bonus points may be awarded to any Yes challenge that shows unique creativity or insight into the future scene.

	Rel	Category	O	M/NR/D/B	Feedback on Step 1 Challenges (Last column: research shown)	
1	<input type="checkbox"/>		<input type="checkbox"/>			<input type="checkbox"/>
2	<input type="checkbox"/>		<input type="checkbox"/>			<input type="checkbox"/>
3	<input type="checkbox"/>		<input type="checkbox"/>			<input type="checkbox"/>
4	<input type="checkbox"/>		<input type="checkbox"/>			<input type="checkbox"/>
5	<input type="checkbox"/>		<input type="checkbox"/>			<input type="checkbox"/>
6	<input type="checkbox"/>		<input type="checkbox"/>			<input type="checkbox"/>
7	<input type="checkbox"/>		<input type="checkbox"/>			<input type="checkbox"/>
8	<input type="checkbox"/>		<input type="checkbox"/>			<input type="checkbox"/>
9	<input type="checkbox"/>		<input type="checkbox"/>			<input type="checkbox"/>
10	<input type="checkbox"/>		<input type="checkbox"/>			<input type="checkbox"/>
11	<input type="checkbox"/>		<input type="checkbox"/>			<input type="checkbox"/>
12	<input type="checkbox"/>		<input type="checkbox"/>			<input type="checkbox"/>
13	<input type="checkbox"/>		<input type="checkbox"/>			<input type="checkbox"/>
14	<input type="checkbox"/>		<input type="checkbox"/>			<input type="checkbox"/>
15	<input type="checkbox"/>		<input type="checkbox"/>			<input type="checkbox"/>
16	<input type="checkbox"/>		<input type="checkbox"/>			<input type="checkbox"/>
0	0	0	0	Research	Creativity	

- Relevant** -- challenge has possibility of occurring
- Maybe** -- challenge needs additional information to be Relevant
- Not Relevant** -- challenge idea not related to FS
- Duplicate** -- statement duplicates or is very similar to another challenge
- Blank** -- no student response provided
- Solution** -- statement is a solution to a challenge
- Original** -- challenge shows extraordinary insight into the future scene

### Category List

- |                           |                          |
|---------------------------|--------------------------|
| 1. Arts & Aesthetics      | 12. Law & Justice        |
| 2. Basic Needs            | 13. Miscellaneous 1      |
| 3. Business & Commerce    | 14. Miscellaneous 2      |
| 4. Communication          | 15. Physical Health      |
| 5. Culture & Religion     | 16. Psychological Health |
| 6. Defense                | 17. Recreation           |
| 7. Economics              | 18. Science              |
| 8. Education              | 19. Social Relationships |
| 9. Environment            | 20. Technology           |
| 10. Ethics and Morality   | 21. Transportation       |
| 11. Government & Politics |                          |

### Step 1 Scores

Fluency	1-16	0
Flexibility	1-16	0
Clarity	1-10	
Originality		0
<b>Step 1 Total Points</b>		<b>0</b>

**Step 1 Comments:**

Step 2 Scoring Guidelines		Low  High		
<b>Condition Phrase (C)</b>	Missing <b>0</b>	Present but does not use accurate info or reasonable assumptions, or written as entire challenge <b>2</b>	Present & uses accurate info but does not relate to KVP <b>4</b>	Relates to KVP & uses accurate information from FS/research <b>6</b>
<b>Stem &amp; Key Verb Phrase (KVP)</b>	Missing <b>0</b>	Present but has two verb phrases <b>2</b>	Present but has two objects or two modifiers <b>4</b>	Present and contains a single active verb or verb phrase <b>6</b>
<b>Purpose (P)</b>	Missing <b>0</b>	Present but has two purposes or repeats KVP <b>2</b>	Present but does not have a clear relationship to KVP <b>4</b>	Present and singular with logical relation to KVP <b>6</b>
<b>Future Scene Parameters</b>	All missing <b>0</b>	1 parameter present <b>2</b>	2 parameters present <b>4</b>	Topic, place, time all present <b>6</b>
<b>Significance:</b> Assesses the importance of the UP to the Future Scene charge	Weak relationship to FS, topic, and charge <b>1 2 3</b>	Identifies minor issue from the FS <b>4 5 6</b>	Identifies an appropriate issue related to the FS charge <b>7 8</b>	Identifies an important issue related to the FS charge with a meaningful connection to the topic <b>9 10</b>
<b>Scope:</b> Measures the manageability and focus of the UP	Weak relationship to FS, topic, and charge <b>1 2 3</b>	UP so broad or narrow that it is unlikely to be attainable or effective <b>4 5 6</b>	Consideration given to focus & manageability; impact may be limited <b>7 8</b>	Identifies small enough segment of the FS to be manageable but sizeable enough to be impactful <b>9 10</b>
<b>Clarity:</b> Examines effective communication of the intent of the UP	Difficult to determine intent of UP <b>1 2 3</b>	Action to be taken (KVP) vague; intent of UP unclear <b>4 5 6</b>	Effort made to clearly define action & explain its importance <b>7 8</b>	UP clearly defines action & communicates its importance effectively <b>9 10</b>

Condition Phrase:

Stem:  "How might we..." OR  "In what ways might we..."

Key Verb Phrase: \_\_\_\_\_

Purpose: \_\_\_\_\_

Parameters: **Topic:** \_\_\_\_\_ **Place:** \_\_\_\_\_ **Time:** \_\_\_\_\_

**Step 2 Comments:**

Step 2 Scores		
Condition Phrase	0-6	
Stem & KVP	0-6	
Purpose	0-6	
Parameters	0-6	
Significance	1-10	
Scope	1-10	
Clarity	1-10	
<b>Step 2 Total Points</b>		<b>0</b>

<b>Step 3 Scoring Guidelines</b>	<b>Low</b>	<b>High</b>
<b>Fluency</b> – A Relevant solution idea addresses the KVP and does not negate the purpose	Fluency is determined by totaling the number of Relevant solutions. Number of relevant Solutions:      1    2    3    4    5    6    7    8    9    10    11    12    13    14    15    16	
<b>Flexibility</b> – Measures the number of different categories in Relevant solutions	Flexibility is determined by awarding one point per different category used. Number of categories used:      1    2    3    4    5    6    7    8    9    10    11    12    13    14    15    16	
<b>Elaboration/Clarity</b> – Has relevant who, what, why, and how elements; Measures clarity and conciseness of writing	Not enough detail/elaboration to convey meaning of solution ideas, <u>OR</u> excessive detail obscures solutions  1    2    3	Most solutions convey basic idea; some lack detail/elaboration <u>OR</u> too much detail confuses solution ideas; WHO's random or repetitive  4    5    6
		Appropriate explanations with some detail/ elaboration; some WHO's not logical/appropriate  7    8
		Clear, concise descriptions with adequate details/elaboration; most include logical who, what, how/why  9    10
<b>Originality</b> – Three bonus points may be awarded to any Relevant solution that shows unique creativity or insight into the future scene.		

	Rel	Category	O	NR/D/B	Feedback on Step 3 Solutions (Last column: research shown)	
1	<input type="checkbox"/>		<input type="checkbox"/>			<input type="checkbox"/>
2	<input type="checkbox"/>		<input type="checkbox"/>			<input type="checkbox"/>
3	<input type="checkbox"/>		<input type="checkbox"/>			<input type="checkbox"/>
4	<input type="checkbox"/>		<input type="checkbox"/>			<input type="checkbox"/>
5	<input type="checkbox"/>		<input type="checkbox"/>			<input type="checkbox"/>
6	<input type="checkbox"/>		<input type="checkbox"/>			<input type="checkbox"/>
7	<input type="checkbox"/>		<input type="checkbox"/>			<input type="checkbox"/>
8	<input type="checkbox"/>		<input type="checkbox"/>			<input type="checkbox"/>
9	<input type="checkbox"/>		<input type="checkbox"/>			<input type="checkbox"/>
10	<input type="checkbox"/>		<input type="checkbox"/>			<input type="checkbox"/>
11	<input type="checkbox"/>		<input type="checkbox"/>			<input type="checkbox"/>
12	<input type="checkbox"/>		<input type="checkbox"/>			<input type="checkbox"/>
13	<input type="checkbox"/>		<input type="checkbox"/>			<input type="checkbox"/>
14	<input type="checkbox"/>		<input type="checkbox"/>			<input type="checkbox"/>
15	<input type="checkbox"/>		<input type="checkbox"/>			<input type="checkbox"/>
16	<input type="checkbox"/>		<input type="checkbox"/>			<input type="checkbox"/>
	0	0	0	<b>Research</b>		<b>Creativity</b>

**Relevant** -- Solution idea addresses KVP & clearly supports Purpose  
**Not Relevant** -- Solution idea needs additional information to be Relevant  
**Duplicate** -- statement duplicates, or very similar to, another solution  
**Blank** -- no student response provided  
**Original** -- solution idea shows extraordinary insight or creative thinking

- | Category List             |                          |
|---------------------------|--------------------------|
| 1. Arts & Aesthetics      | 12. Law & Justice        |
| 2. Basic Needs            | 13. Miscellaneous 1      |
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| 6. Defense                | 17. Recreation           |
| 7. Economics              | 18. Science              |
| 8. Education              | 19. Social Relationships |
| 9. Environment            | 20. Technology           |
| 10. Ethics and Morality   | 21. Transportation       |
| 11. Government & Politics |                          |

Step 3 Scores		
Fluency	1-16	0
Flexibility	1-16	0
Elab/Clarity	1-10	0
Originality		0
<b>Step 3 Total Points</b>		<b>0</b>

**Step 3 Comments:**

<b>Steps 4 &amp; 5 Scoring Guidelines</b>		<b>Low</b>					<b>High</b>			
<b>Criteria Correctly Written</b> – Measure of degree, single dimension, worded in desired direction	Two points are awarded for each correctly written criterion. (A correctly written criterion must include a superlative – “st” word.)									
	Number of correctly written criteria:	<b>0</b>	1	2	3	4	5			
	Number of points awarded:	<b>0</b>	2	4	6	8	10			
<b>Applicability and Relevance</b> to the Underlying Problem	Generic = 1 point, Modified = 2 points, Advanced = 4 points. Criteria that are not correctly written are still evaluated for Applicability and Relevance.									
<b>Grid Correctly Used</b>	Top solution not used in Step 6; 4+ errors	1	Grid contains 3 errors	2	Grid contains 2 errors	3	Grid contains 1 error	4	Grid contains no errors	5

	Correctly Written	[A]dvanced 4 points	[M]odified 2 points	[G]eneric 1 point	NR = Not relevant 0	A/M/G/NR	Appl/Rel points
1	<input type="checkbox"/>						0
2	<input type="checkbox"/>						0
3	<input type="checkbox"/>						0
4	<input type="checkbox"/>						0
5	<input type="checkbox"/>						0
<b>Total</b>							<b>0</b>


**Steps 4 & 5 Comments:**

<b>Steps 4-5 Scores</b>		
Correctly Written	0-10	0
Applicability/Relevance	0-20	0
Correctly Used	1-5	0
<b>Steps 4 &amp; 5 Total Points</b>		<b>0</b>

Step 6 Scoring Guidelines	Low <span style="font-size: 2em;">→</span> High			
<b>Impact on Future Scene</b> – Measures the positive effect of the AP on the Future Scene (FS) situation	Action Plan (AP) has a negative or no impact on FS 2	AP has minimal positive impact on FS 4      6	AP has moderate positive impact on FS 8	AP has strong positive impact on FS 10
<b>Relationship to UP</b> – Assesses the extent to which the AP solves the UP	AP is unrelated to UP 1	AP addresses some aspects of UP 2      3	AP adequately considers KVP and Purpose of UP 4	AP effectively responds to KVP and Purpose of UP 5
<b>Criteria in Development of Action Plan</b> – Measures the degree to which the criteria are addressed in the	AP does not address the criteria 1	AP's connection to criteria is minimal or unclear 2      3	AP makes some valid connections to criteria 4	AP addresses criteria in a convincing manner 5
<b>Humaneness</b> – Measures the productive, positive potential of the AP	Negative or destructive AP 1      2	AP is neutral; neither positive nor negative 3	Constructive potential evident 4	AP is positive and constructive 5
<b>Completeness</b> – Considers the extent to which the AP is thoughtfully elaborated	Details are minimal; rewrite of Step 3 solution idea 2      4	Provides some considerations needed to carry out AP 6      8      10	Contains many elements of AP implementation 12      14      16	Presents organized, comprehensive explanation of process needed to achieve AP 18      20

**Step 6 Comments:**

Step 6 Scores	
Impact on FS	2-10
Relationship to UP	1-5
Criteria in Dev	1-5
Humaneness	1-5
Completeness	2-20
Step 6 Total Points	0

<b>Overall Score Guidelines</b>		<b>Low</b>  <b>High</b>			
<b>Research Applied</b> – Evidence of research throughout booklet	Minimal/limited demonstration of research, terms, etc 1    2    3	Average demonstration of terms, research; more possible. 4    5    6	Application of terms, research clearly evident in booklet 7    8	Excellent application of terms, research throughout booklet 9    10	
<b>Creative Strength/Futuristic Thinking</b> – Evidence of creativity and futuristic concepts throughout booklet	Booklet has basic ideas with minimal development; ideas have minimal futuristic concepts 1    2    3	Most use existing or traditional ideas with good development; a few ideas have futuristic concepts 4    5    6	Evidence of innovative thinking and fresh insights; good use of futuristic concepts 7    8	Strong display of inventive ideas; goes beyond ordinary; excellent use of futuristic 9    10	
<b>Overall Expression of Ideas</b> – Measures clearness and conciseness of expression throughout booklet	Overall writing difficult to understand; wordiness confuses main idea OR sketchy/vague/ takes leaps in reasoning 1    2    3	Fair; writing inconsistent; may be difficult to understand in places; some wordiness detracts from clarity 4    5    6	Good; most steps contain clear & concise descriptions 7    8	Excellent; clear, concise expression of ideas throughout 9    10	
<b>Total Booklet Score</b>		<b>Overall Comments:</b>		<b>Overall Scores</b>	
<b>Team Code</b>  _____				Research Applied 1-10	
<b>Total Points</b>				Creative/Futuristic 1-10	
<b>Rank in Sample</b>				Expression of Ideas 1-10	
<b>0</b>				<b>Overall Total Points</b>	<b>0</b>
<b>1</b>					