

Use Attainability Analysis

for

WBID 2516 Spring Creek

Submitted by

Missouri Department of Natural Resources Staff

To

Missouri Department of Natural Resources  
Water Protection Program

Date Received: July 18, 2005



# Field Data Sheet for Recreational Use Stream Surveys

## Data Sheet B - Site Characterization

(A separate data sheet must be completed for each site)

|   |   |             |  |
|---|---|-------------|--|
| Missouri WBID #: WB2516-01                | Site Location Description: NW1/4 NE1/4 SEC.13 T.26N. R.10W. |             |  |
| Site GPS Coordinates: N. 36.93584         |   | W. 91.99265 |  |
| Date & Time: 6/21/05 12:30 pm             | Facility Name: NA   |             |  |
| Personnel: Keith Knelle, Leon Thompson    | Permit Number: NA   |             |  |
| Current Weather Conditions: Mostly cloudy | Weather Conditions for Past 7 days: Scattered showers       |             |  |
| Photo Ids: Upstream: WBU2516-01           | Downstream: WBD2516-01                                      | Other:      |  |

**Uses Observed\*:**

|                                       |                                      |                                       |   |                                       |
|---------------------------------------|--------------------------------------|---------------------------------------|---|---------------------------------------|
| <input type="checkbox"/> Swimming     | <input type="checkbox"/> Skin Diving | <input type="checkbox"/> Scuba diving | <input type="checkbox"/> Tubing                       | <input type="checkbox"/> Water skiing |
| <input type="checkbox"/> Wind surfing | <input type="checkbox"/> Kayaking    | <input type="checkbox"/> Boating      | <input type="checkbox"/> Wading                       | <input type="checkbox"/> Rafting      |
| <input type="checkbox"/> Hunting      | <input type="checkbox"/> Trapping    | <input type="checkbox"/> Fishing      | <input checked="" type="checkbox"/> None of the above | <input type="checkbox"/> Other:       |

Describe: (include number of individuals recreating, frequency of use, photo-documentation of evidence of recreational uses, etc.)

**Surrounding Conditions\*:** (Mark all that promote or impede recreational uses. Attach photos of evidence or unusual items of interest.)

|  |                                      |  |  |   |
|--|--------------------------------------|--|--|---|
| <input type="checkbox"/> City/county parks | <input type="checkbox"/> Playgrounds | <input type="checkbox"/> MDC conservation lands  | <input type="checkbox"/> Urban areas   | <input type="checkbox"/> Campgrounds    |
| <input type="checkbox"/> Boating accesses  | <input type="checkbox"/> State parks | <input type="checkbox"/> National forests        | <input type="checkbox"/> Nature trails | <input type="checkbox"/> Stairs/walkway |
| <input type="checkbox"/> No trespass sign  | <input type="checkbox"/> Fence       | <input checked="" type="checkbox"/> Steep slopes | <input type="checkbox"/> Other:        |   |

**Evidence of Human Use\*:**

|   |  |  |   |  |
|---|--|--|---|--|
| <input type="checkbox"/> Roads                  | <input type="checkbox"/> Foot paths/prints | <input type="checkbox"/> Dock/platform | <input type="checkbox"/> Livestock Watering | <input type="checkbox"/> RV / ATV Tracks |
| <input type="checkbox"/> Rope swing             | <input type="checkbox"/> Camping Sites     | <input type="checkbox"/> Fire pit/ring | <input type="checkbox"/> NPDES Discharge    | <input type="checkbox"/> Fishing Tackle  |
| <input checked="" type="checkbox"/> Other: None |  |  |   |  |

**Site Locations Map(s):** Attach a map of entire segment with assessment sites clearly labeled. Mark any other items that may be of interest. (Include photographs)

\*Some of this information is not intended to directly influence a decision on any one particular recreational use analysis but may point to conditions that need further analysis or that effect another use.

**Field Data Sheet for Recreational Use Stream Surveys**

**Data Sheet B - Site Characterization**

Page Two - WBID #: WB2516-01

**Stream Morphology:**

**Upstream View Physical Dimensions: No water observed.**

|        |             |              |                  |                                   |
|--------|-------------|--------------|------------------|-----------------------------------|
| Riffle | Width (ft): | Length (ft): | Avg. Depth (ft): | Max. Depth (ft):                  |
| Run    | Width (ft): | Length (ft): | Avg. Depth (ft): | Max. Depth (ft):                  |
| Pool   | Width (ft): | Length (ft): | Avg. Depth (ft): | Max. Depth (ft):                  |
| Flow   | Present?    | Yes          | No               | Estimated (ft <sup>3</sup> /sec): |

**Downstream View Physical Dimensions: No water observed.**

|        |             |              |                  |                                   |
|--------|-------------|--------------|------------------|-----------------------------------|
| Riffle | Width (ft): | Length (ft): | Avg. Depth (ft): | Max. Depth (ft):                  |
| Run    | Width (ft): | Length (ft): | Avg. Depth (ft): | Max. Depth (ft):                  |
| Pool   | Width (ft): | Length (ft): | Avg. Depth (ft): | Max. Depth (ft):                  |
| Flow   | Present?    | Yes          | No               | Estimated (ft <sup>3</sup> /sec): |

**Substrate\*:** (These values should add up to 100%.)

|            |            |         |         |            |           |
|------------|------------|---------|---------|------------|-----------|
| 30% Cobble | 60% Gravel | 5% Sand | 5% Silt | % Mud/Clay | % Bedrock |
|------------|------------|---------|---------|------------|-----------|

**Aquatic Vegetation\*:** (note amount of vegetation or algal growth at the assessment site)

|      |
|------|
| None |
|------|

**Water Characteristics\*:** (Mark all that apply.)

|                  |        |        |                |       |             |
|------------------|--------|--------|----------------|-------|-------------|
| Odor:            | Sewage | Musky  | Chemical       | None  | Other:      |
| Color:           | Clear  | Green  | Gray           | Milky | Other: None |
| Bottom Deposit:  | Sludge | Solids | Fine sediments | None  | Other:      |
| Surface Deposit: | Oil    | Scum   | Foam           | None  | Other:      |

**Comments:** Please attach additional comments (including information from interviews) to this form.

\*This information is not to be used solely for removal of a recreational use designation but rather is to provide a more comprehensive understanding of water conditions. Consequently, this information is not intended to directly influence a decision on the recreation use analysis but may point to conditions that need further analysis or that effect another use.

I, the undersigned, hereby affirm to the best of my knowledge, that all information reported on this UAA datasheet is true and accurate.

Signed: K. J. H. Date: 06/21/05\_\_\_\_\_

Organization: Department of Natural Resources SWCP

Position: Soil Scientist\_\_\_\_\_

WBID 2516 – Downstream #1



WBID 2516 – Upstream #1



# Field Data Sheet for Recreational Use Stream Surveys

## Data Sheet B - Site Characterization

(A separate data sheet must be completed for each site)

|   |   |                   |  |
|---|---|-------------------|--|
| Missouri WBID #: WB2516-02                | Site Location Description: NE1/4 NW1/4 SEC.13 T.26N. R.10W. |                   |  |
| Site GPS Coordinates: N. 36.93589         |   | W. 91.99436       |  |
| Date & Time: 6/21/05 12:15 pm             | Facility Name: NA   |                   |  |
| Personnel: Leon Thompson, Keith Knelle    | Permit Number: NA   |                   |  |
| Current Weather Conditions: Mostly cloudy | Weather Conditions for Past 7 days: Scattered showers       |                   |  |
| Photo Ids: Upstream: WBU2516-02           | Downstream: WBD2516-02                                      | Other: WBE2516-02 |  |

### Uses Observed\*:

|  |                                      |                                       |   |                                       |
|--|--------------------------------------|---------------------------------------|---|---------------------------------------|
| <input type="checkbox"/> Swimming  | <input type="checkbox"/> Skin Diving | <input type="checkbox"/> Scuba diving | <input type="checkbox"/> Tubing                       | <input type="checkbox"/> Water skiing |
| <input type="checkbox"/> Wind surfing  | <input type="checkbox"/> Kayaking    | <input type="checkbox"/> Boating      | <input type="checkbox"/> Wading                       | <input type="checkbox"/> Rafting      |
| <input type="checkbox"/> Hunting   | <input type="checkbox"/> Trapping    | <input type="checkbox"/> Fishing      | <input checked="" type="checkbox"/> None of the above | <input type="checkbox"/> Other:       |
| Describe: (include number of individuals recreating, frequency of use, photo-documentation of evidence of recreational uses, etc.) |                                      |                                       |   |                                       |
|  |                                      |                                       |   |                                       |

### Surrounding Conditions\*: (Mark all that promote or impede recreational uses. Attach photos of evidence or unusual items of interest.)

|  |   |   |  |   |
|--|---|---|--|---|
| <input type="checkbox"/> City/county parks | <input type="checkbox"/> Playgrounds      | <input type="checkbox"/> MDC conservation lands | <input type="checkbox"/> Urban areas   | <input type="checkbox"/> Campgrounds    |
| <input type="checkbox"/> Boating accesses  | <input type="checkbox"/> State parks      | <input type="checkbox"/> National forests       | <input type="checkbox"/> Nature trails | <input type="checkbox"/> Stairs/walkway |
| <input type="checkbox"/> No trespass sign  | <input checked="" type="checkbox"/> Fence | <input type="checkbox"/> Steep slopes           | <input type="checkbox"/> Other:        |   |

### Evidence of Human Use\*:

|   |  |  |   |  |
|---|--|--|---|--|
| <input type="checkbox"/> Roads                  | <input type="checkbox"/> Foot paths/prints | <input type="checkbox"/> Dock/platform | <input type="checkbox"/> Livestock Watering | <input type="checkbox"/> RV / ATV Tracks |
| <input type="checkbox"/> Rope swing             | <input type="checkbox"/> Camping Sites     | <input type="checkbox"/> Fire pit/ring | <input type="checkbox"/> NPDES Discharge    | <input type="checkbox"/> Fishing Tackle  |
| <input checked="" type="checkbox"/> Other: None |  |  |   |  |

**Site Locations Map(s):** Attach a map of entire segment with assessment sites clearly labeled. Mark any other items that may be of interest. (Include photographs)

\*Some of this information is not intended to directly influence a decision on any one particular recreational use analysis but may point to conditions that need further analysis or that effect another use.

**Field Data Sheet for Recreational Use Stream Surveys**

**Data Sheet B - Site Characterization**

Page Two - WBID #: WB2516-02

**Stream Morphology:**

**Upstream View Physical Dimensions: No water observed.**

|        |             |              |                  |                                   |
|--------|-------------|--------------|------------------|-----------------------------------|
| Riffle | Width (ft): | Length (ft): | Avg. Depth (ft): | Max. Depth (ft):                  |
| Run    | Width (ft): | Length (ft): | Avg. Depth (ft): | Max. Depth (ft):                  |
| Pool   | Width (ft): | Length (ft): | Avg. Depth (ft): | Max. Depth (ft):                  |
| Flow   | Present?    | Yes          | No               | Estimated (ft <sup>3</sup> /sec): |

**Downstream View Physical Dimensions: No water observed.**

|        |             |              |                  |                                   |
|--------|-------------|--------------|------------------|-----------------------------------|
| Riffle | Width (ft): | Length (ft): | Avg. Depth (ft): | Max. Depth (ft):                  |
| Run    | Width (ft): | Length (ft): | Avg. Depth (ft): | Max. Depth (ft):                  |
| Pool   | Width (ft): | Length (ft): | Avg. Depth (ft): | Max. Depth (ft):                  |
| Flow   | Present?    | Yes          | No               | Estimated (ft <sup>3</sup> /sec): |

**Substrate\*:** (These values should add up to 100%.)

|            |            |        |        |            |           |
|------------|------------|--------|--------|------------|-----------|
| 10% Cobble | 90% Gravel | % Sand | % Silt | % Mud/Clay | % Bedrock |
|------------|------------|--------|--------|------------|-----------|

**Aquatic Vegetation\*:** (note amount of vegetation or algal growth at the assessment site)

None

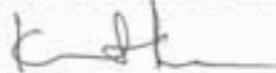
**Water Characteristics\*:** (Mark all that apply.)

|                  |        |        |                |       |             |
|------------------|--------|--------|----------------|-------|-------------|
| Odor:            | Sewage | Musky  | Chemical       | None  | Other:      |
| Color:           | Clear  | Green  | Gray           | Milky | Other: None |
| Bottom Deposit:  | Sludge | Solids | Fine sediments | None  | Other:      |
| Surface Deposit: | Oil    | Scum   | Foam           | None  | Other:      |

**Comments:** Please attach additional comments (including information from interviews) to this form.

\*This information is not to be used solely for removal of a recreational use designation but rather is to provide a more comprehensive understanding of water conditions. Consequently, this information is not intended to directly influence a decision on the recreation use analysis but may point to conditions that need further analysis or that affect another use.

I, the undersigned, hereby affirm to the best of my knowledge, that all information reported on this UAA datasheet is true and accurate.

Signed:  Date: 06/21/05

Organization: Department of Natural Resources SWCP

Position: Soil Scientist

WBID 2516 – Downstream #2



WBID 2516 – Upstream #2



## Field Data Sheet for Recreational Use Stream Surveys

### Data Sheet B - Site Characterization

(A separate data sheet must be completed for each site)

|  |  |   |  |
|--|--|---|--|
| Missouri WBID #: WB2516-03                         | Site Location Description: SE1/4 SE1/4 Sec.14 T.26N., R.10W. |   |  |
| Site GPS Coordinates: N. 36.92705      W. 92.00394 |  |   |  |
| Date & Time: 6/21/05      1:10 pm                  |  | Facility Name: NA                                     |  |
| Personnel: Leon Thompson, Keith Knelle             |  | Permit Number: NA                                     |  |
| Current Weather Conditions: Mostly cloudy          |  | Weather Conditions for Past 7 days: Scattered showers |  |
| Photo Ids: Upstream: WBU2516-03                    | Downstream: WBD2516-03                                       | Other: WBE2516-03                                     |  |

**Uses Observed\*:**

|  |                                      |                                       |   |                                       |
|--|--------------------------------------|---------------------------------------|---|---------------------------------------|
| <input type="checkbox"/> Swimming  | <input type="checkbox"/> Skin Diving | <input type="checkbox"/> Scuba diving | <input type="checkbox"/> Tubing                       | <input type="checkbox"/> Water skiing |
| <input type="checkbox"/> Wind surfing  | <input type="checkbox"/> Kayaking    | <input type="checkbox"/> Boating      | <input type="checkbox"/> Wading                       | <input type="checkbox"/> Rafting      |
| <input type="checkbox"/> Hunting   | <input type="checkbox"/> Trapping    | <input type="checkbox"/> Fishing      | <input checked="" type="checkbox"/> None of the above | <input type="checkbox"/> Other:       |
| Describe: (include number of individuals recreating, frequency of use, photo-documentation of evidence of recreational uses, etc.) |                                      |                                       |   |                                       |
|  |                                      |                                       |   |                                       |

**Surrounding Conditions\*:** (Mark all that promote or impede recreational uses. Attach photos of evidence or unusual items of interest.)

|  |   |  |  |   |
|--|---|--|--|---|
| <input type="checkbox"/> City/county parks | <input type="checkbox"/> Playgrounds      | <input type="checkbox"/> MDC conservation lands  | <input type="checkbox"/> Urban areas   | <input type="checkbox"/> Campgrounds    |
| <input type="checkbox"/> Boating accesses  | <input type="checkbox"/> State parks      | <input type="checkbox"/> National forests        | <input type="checkbox"/> Nature trails | <input type="checkbox"/> Stairs/walkway |
| <input type="checkbox"/> No trespass sign  | <input checked="" type="checkbox"/> Fence | <input checked="" type="checkbox"/> Steep slopes | <input type="checkbox"/> Other:        |   |

**Evidence of Human Use\*:**

|   |  |  |   |  |
|---|--|--|---|--|
| <input checked="" type="checkbox"/> Roads | <input type="checkbox"/> Foot paths/prints | <input type="checkbox"/> Dock/platform | <input type="checkbox"/> Livestock Watering | <input type="checkbox"/> RV / ATV Tracks |
| <input type="checkbox"/> Rope swing       | <input type="checkbox"/> Camping Sites     | <input type="checkbox"/> Fire pit/ring | <input type="checkbox"/> NPDES Discharge    | <input type="checkbox"/> Fishing Tackle  |
| <input type="checkbox"/> Other:           |  |  |   |  |

**Site Locations Map(s):** Attach a map of entire segment with assessment sites clearly labeled. Mark any other items that may be of interest. (Include photographs)

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**Field Data Sheet for Recreational Use Stream Surveys**

**Data Sheet B - Site Characterization**

Page Two - WBID #: WB2516-03

**Stream Morphology:**

**Upstream View Physical Dimensions: No water observed.**

|        |             |              |                  |                                   |
|--------|-------------|--------------|------------------|-----------------------------------|
| Riffle | Width (ft): | Length (ft): | Avg. Depth (ft): | Max. Depth (ft):                  |
| Run    | Width (ft): | Length (ft): | Avg. Depth (ft): | Max. Depth (ft):                  |
| Pool   | Width (ft): | Length (ft): | Avg. Depth (ft): | Max. Depth (ft):                  |
| Flow   | Present?    | Yes          | <u>NO</u>        | Estimated (ft <sup>3</sup> /sec): |

**Downstream View Physical Dimensions: No water observed.**

|        |             |              |                  |                                   |
|--------|-------------|--------------|------------------|-----------------------------------|
| Riffle | Width (ft): | Length (ft): | Avg. Depth (ft): | Max. Depth (ft):                  |
| Run    | Width (ft): | Length (ft): | Avg. Depth (ft): | Max. Depth (ft):                  |
| Pool   | Width (ft): | Length (ft): | Avg. Depth (ft): | Max. Depth (ft):                  |
| Flow   | Present?    | Yes          | <u>NO</u>        | Estimated (ft <sup>3</sup> /sec): |

**Substrate\*:** (These values should add up to 100%.)

|            |            |         |          |             |            |
|------------|------------|---------|----------|-------------|------------|
| 10% Cobble | 75% Gravel | 1% Sand | 15% Silt | 1% Mud/Clay | 1% Bedrock |
|------------|------------|---------|----------|-------------|------------|

**Aquatic Vegetation\*:** (note amount of vegetation or algal growth at the assessment site)

None

**Water Characteristics\*:** (Mark all that apply.)

|                  |                                 |                                 |   |                                |                                      |
|------------------|---------------------------------|---------------------------------|---|--------------------------------|--------------------------------------|
| Odor:            | <input type="checkbox"/> Sewage | <input type="checkbox"/> Musky  | <input type="checkbox"/> Chemical       | <input type="checkbox"/> None  | <input type="checkbox"/> Other:      |
| Color:           | <input type="checkbox"/> Clear  | <input type="checkbox"/> Green  | <input type="checkbox"/> Gray           | <input type="checkbox"/> Milky | <input type="checkbox"/> Other: None |
| Bottom Deposit:  | <input type="checkbox"/> Sludge | <input type="checkbox"/> Solids | <input type="checkbox"/> Fine sediments | <input type="checkbox"/> None  | <input type="checkbox"/> Other:      |
| Surface Deposit: | <input type="checkbox"/> Oil    | <input type="checkbox"/> Scum   | <input type="checkbox"/> Foam           | <input type="checkbox"/> None  | <input type="checkbox"/> Other:      |

**Comments:** Please attach additional comments (including information from interviews) to this form.

\*This information is not to be used solely for removal of a recreational use designation but rather is to provide a more comprehensive understanding of water conditions. Consequently, this information is not intended to directly influence a decision on the recreation use analysis but may point to conditions that need further analysis or that effect another use.

I, the undersigned, hereby affirm to the best of my knowledge, that all information reported on this UAA datasheet is true and accurate.

Signed:  Date: 06/21/05 \_\_\_\_\_

Organization: Department of Natural Resources SWCP

Position: Soil Scientist \_\_\_\_\_

WBID 2516 – Downstream #3



WBID 2516 – Upstream #3



**STREAM NAME**

Spring Creek

| PHOTO | WBID | UP | DOWN | USE     | COMMENTS |
|-------|------|----|------|---------|----------|
| 1     | 2516 | X  |      | No use  | No water |
| 2     | 2516 |    | X    | No use  | No water |
| 3     | 2516 | X  |      | No use  | No water |
| 4     | 2516 |    | X    | No use  | No water |
| 5     | 2516 |    | X    | grading |          |
| 6     | 2516 | X  |      | No use  | No water |
| 7     | 2516 |    | X    | No use  | No water |
| 8     |      |    |      |         |          |
| 9     |      |    |      |         |          |
| 10    |      |    |      |         |          |
| 11    |      |    |      |         |          |
| 12    |      |    |      |         |          |
| 13    |      |    |      |         |          |
| 14    |      |    |      |         |          |
| 15    |      |    |      |         |          |
| 16    |      |    |      |         |          |
| 17    |      |    |      |         |          |
| 18    |      |    |      |         |          |
| 19    |      |    |      |         |          |
| 20    |      |    |      |         |          |
| 21    |      |    |      |         |          |
| 22    |      |    |      |         |          |
| 23    |      |    |      |         |          |
| 24    |      |    |      |         |          |
| 25    |      |    |      |         |          |
| 26    |      |    |      |         |          |
| 27    |      |    |      |         |          |
| 28    |      |    |      |         |          |
| 29    |      |    |      |         |          |
| 30    |      |    |      |         |          |
| 31    |      |    |      |         |          |
| 32    |      |    |      |         |          |
| 33    |      |    |      |         |          |
| 34    |      |    |      |         |          |
| 35    |      |    |      |         |          |
| 36    |      |    |      |         |          |
| 37    |      |    |      |         |          |
| 38    |      |    |      |         |          |
| 39    |      |    |      |         |          |



