

# A2J Author® New User Training

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# Nested Repeat Loops

# Agenda

- Repeat Loops in A2J & HotDocs – the problem
- The Solution
- Creating the A2J Guided Interview
- The HotDocs component
- Demo
- Questions



# The Problem

- HotDocs Explicit Indexing: two-digit
  - Ex. Child first name TE [2]
  - Child city TE [2,1]
- A2J's Explicit Indexing: one indexing or counting variable at a time
  - Ex. Child first name TE [2]
  - Child City TE [21]



# The Solution: A Work Around

| A2J Counter Variable | Corresponding HotDocs Variable | Purpose   |
|----------------------|--------------------------------|---|
| OutsideCount         | ParentCtr NU                   | Tracks outside or parent loops                  |
| InsideCount          | ChildCtr NU                    | Tracks inside or child loops                    |
| AbsoluteCount        | ExpIndex NU                    | Unique index for each answer in the child loops |
| Array size NU        | Array size NU                  | Maximum number of answers in any child loop     |
| ICap NU              | ICap NU                        | Total iterations in any given child loop        |



# Child Loop Variables

Unlike most interviews, the HotDocs variables for the inner or child loops are not going to be used in the A2J Guided Interview.

Instead, we will create distinct A2J variables and HotDocs variables for the inner loops.

A HotDocs computation will parse and map the A2J variables to the corresponding HotDocs variables to simulate explicit indexing.



# The A2J Component

2-Explanatory page X

Repeat Options:

Counting Variable:

**Advanced Logic**

Before:

After:

```
SET [Array size NU] TO 10
SET [InsideCount] TO 1
SET [OutsideCount] TO 1
SET [A2] repeat trigger TF TO "true"
```



# The A2J Component

3-Outside loop 1

Text audio:

+ Upload...

Learn More prompt:

Help style:  ▾

Help:

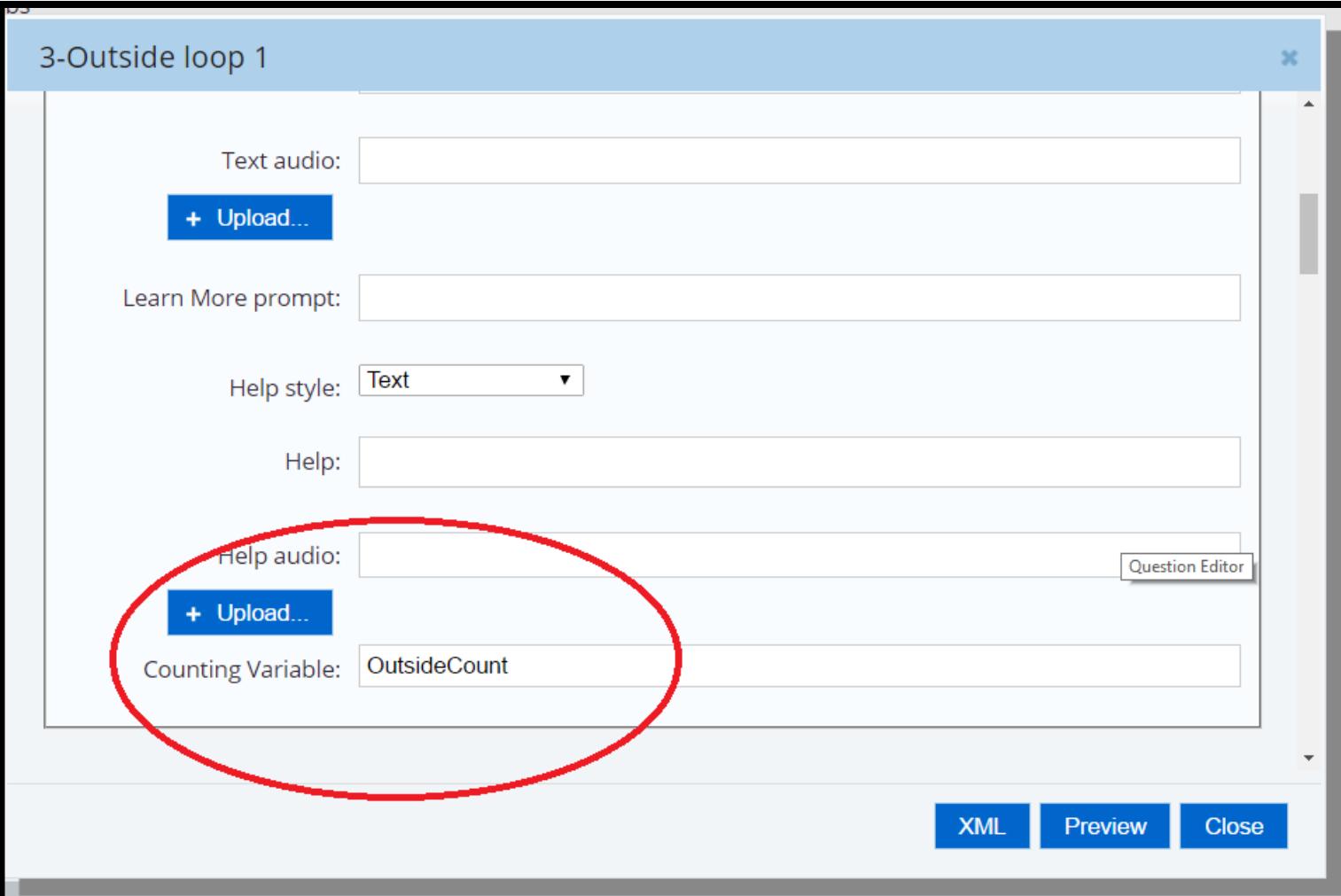
Help audio:

+ Upload...

Counting Variable:

Question Editor

XML Preview Close



# The A2J Component

JDS

3-Outside loop 1

Destination: 4-Outside loop 2

Repeat Options: Normal

Counting Variable:

Advanced Logic

Before:

After:

```
SET [Add inside repeat TF] TO "true"  
SET [AbsoluteCount] TO [OutsideCount]*[Array size NU] +1
```

XML Preview Close

Required array size. This A2J Guided Interview only allows for 10 children. If you have more than 10 children, please consider using a different interview type.

The screenshot shows a software window titled 'JDS' with a sub-titled '3-Outside loop 1'. Inside, there's a configuration panel for a 'Repeat Options' step. It includes fields for 'Destination' (set to '4-Outside loop 2'), 'Repeat Options' (set to 'Normal'), and 'Counting Variable' (empty). Below this is an 'Advanced Logic' section with 'Before' and 'After' code snippets. The 'Before' section is empty. The 'After' section contains the following A2J script:  
SET [Add inside repeat TF] TO "true"  
SET [AbsoluteCount] TO [OutsideCount]\*[Array size NU] +1



# The A2J Component

5-Inside loop

Question text

Text: Provide %%[Child name first TE#OutsideCount]%%'s prior address for the last five years. Note: List only 1 address on this page. If %%[Child name first TE#OutsideCount]%% has other addresses for the last five years, click "List Another". Otherwise, click "Move On".

Text audio:

+ Upload...

Learn More prompt:

Help style:

Help:

Help audio:

+ Upload...

Counting Variable: AbsoluteCount

XML Preview Close



# The A2J Component

5-Inside loop

COUNTING VARIABLE.

Advanced Logic

Before:

After:

```
IF [Add inside repeat TF#AbsoluteCount] = true AND [InsideCount]<=[Array size NU]
SET [InsideCount] TO [AbsoluteCount] - ([Array size NU]*[OutsideCount])+1
END IF
IF [Add inside repeat TF#AbsoluteCount] = true AND [InsideCount]<=[Array size NU]
SET [AbsoluteCount] TO [AbsoluteCount] + 1
END IF
IF [Add inside repeat TF#AbsoluteCount]=true AND [InsideCount]>[Array size NU]
SET [Icap NU#OutsideCount] to InsideCount
END IF
IF [Add inside repeat TF#AbsoluteCount] = true AND [InsideCount]>[Array size NU]
GOTO "7-Oops exceeded array size"
END IF
IF [Add inside repeat TF#AbsoluteCount] = false
SET [ICap NU#OutsideCount] TO InsideCount
END IF
```

XML Preview Close



# The Advanced Section Broken Down

|   | <b>Condition</b>  | <b>Action</b>   | <b>Explanation</b>  |
|---|---|---|---|
| 1 | [Add inside repeat TF#AbsoluteCount] = true AND InsideCount<= [Array size NU] | IF TRUE THEN SET InsideCount=[AbsoluteCount]-[Array size NU]*[OutsideCount]+1 | Increments InsideCount if InsideCount is less than or equal to Array size NU.   |
| 2 | [Add inside repeat TF#AbsoluteCount]=true AND [InsideCount]<=[Array size NU]  | IF TRUE THEN SET AbsoluteCount=AbsoluteCount + 1                              | Increments AbsoluteCount if InsideCount is less than or equal to Array size NU  |
| 3 | [Add inside repeatTF#AbsoluteCount]=true AND [InsideCount]>[Array size NU]    | IF TRUE THEN SET ICap NU#OutsideCount=InsideCount                             | Sets the Iteration Cap counter (ICap NU) for this outer loop to the value of InsideCount if InsideCount is greater than Array size NU |
| 4 | [Add inside repeat TF#AbsoluteCount]=true AND [InsideCount]>[Array size NU]   | IF TRUE THEN GOTO (2)1-Oops!  | Moves to the error message if the user tries to enter an 11 <sup>th</sup> city.   |
| 5 | [Add inside repeat TF#AbsoluteCount]=false                                    | IF TRUE THEN SET ICap NU#OutsideCount= InsideCount                            | If Move On is selected, locks the Iteration cap (ICap NU) for the outer loop to the value of InsideCount, which is not incremented.   |

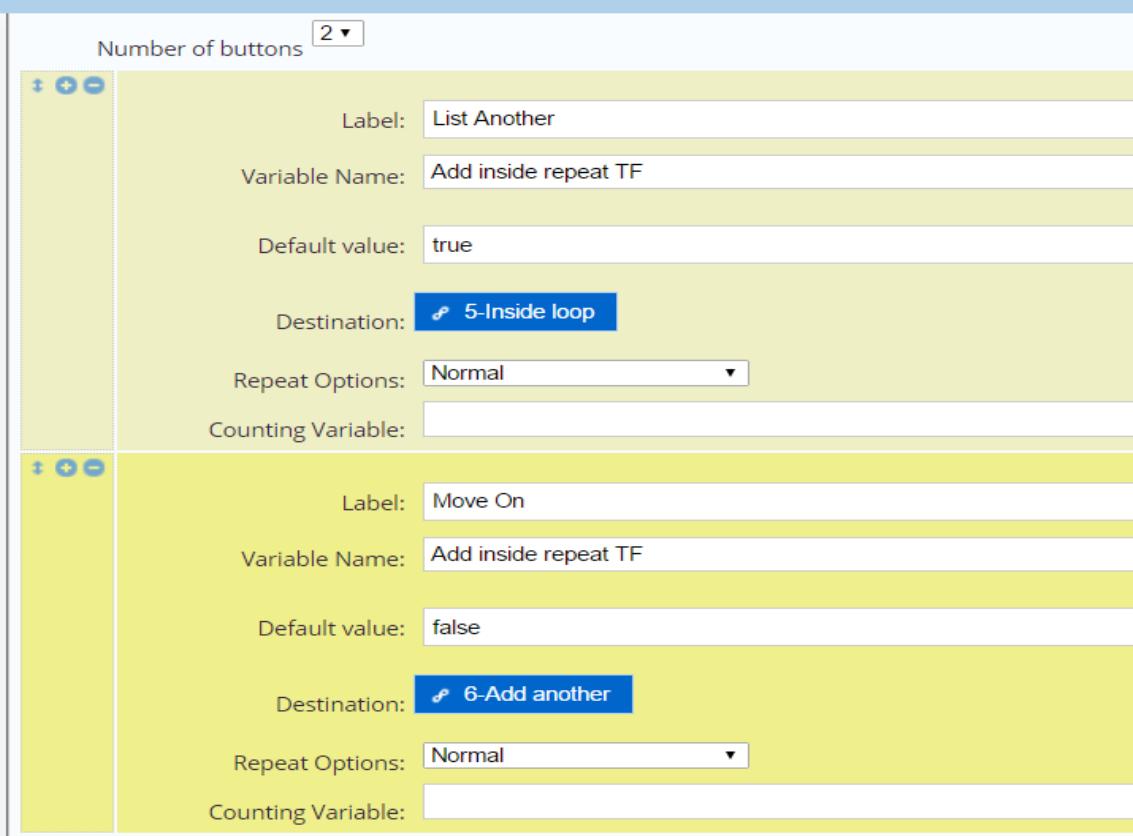
# The Two Most Important Buttons

5-Inside loop

Number of buttons: 2

|   |  |
|---|--|
| <input type="button" value="List Another"/> | <p>Label: List Another</p> <p>Variable Name: Add inside repeat TF</p> <p>Default value: true</p> <p>Destination: 5-Inside loop</p> <p>Repeat Options: Normal</p> <p>Counting Variable:</p> |
| <input type="button" value="Move On"/>      | <p>Label: Move On</p> <p>Variable Name: Add inside repeat TF</p> <p>Default value: false</p> <p>Destination: 6-Add another</p> <p>Repeat Options: Normal</p> <p>Counting Variable:</p>     |

XML | Preview | Close



List Another Button

Move On Button

# The HotDocs Component

|                           |  |  |  |
|---------------------------|--|--|--|
| and                       |  |  |  |
| «Respondent name full TE» |  |  |  |
| Respondent.               |  |  |  |

---

«IF ANSWERED(A2J repeat trigger TF) AND A2J repeat trigger TF» «Child loop variables parser CO»«END IF»

1. All minor children, including those born to or adopted by both parties.

|      |            |                             |
|------|------------|-----------------------------|
| Name | Birth Year | Minor primarily lives with: |
|------|------------|-----------------------------|

«REPEAT Children Information»

|                      |                       |  |
|----------------------|-----------------------|--|
| «Child name full CO» | «Child birth year TE» | «IF ANSWERED(Minor lives with MC) AND Minor lives with MC = "Petitioner"» <input checked="" type="checkbox"/> «ELSE» <input type="checkbox"/> «END IF» Petitioner<br>«IF ANSWERED(Minor lives with MC) AND Minor lives with MC = "Respondent"» <input checked="" type="checkbox"/> «ELSE» <input type="checkbox"/> «END IF» Respondent<br>«IF ANSWERED(Minor lives with MC) AND Minor lives with MC = "Petitioner and Respondent"» <input checked="" type="checkbox"/> «ELSE» <input type="checkbox"/> «END IF» Both «IF ANSWERED(Minor lives with MC) AND Minor lives with MC = "Other"» <input checked="" type="checkbox"/> «ELSE» <input type="checkbox"/> «END IF» Other |
|----------------------|-----------------------|--|

«END REPEAT»

2. Residences of the Child(ren).

| Children's Names | Address | Starting MM/YY | Ending MM/Y Y |
|------------------|---------|----------------|---------------|
|------------------|---------|----------------|---------------|

«REPEAT Children Information»

|                       |                      |                    |                  |
|-----------------------|----------------------|--------------------|------------------|
| «Child name first TE» | «Current address TE» | «Start Current TE» | Still lives here |
|-----------------------|----------------------|--------------------|------------------|

«REPEAT Prior Residence»

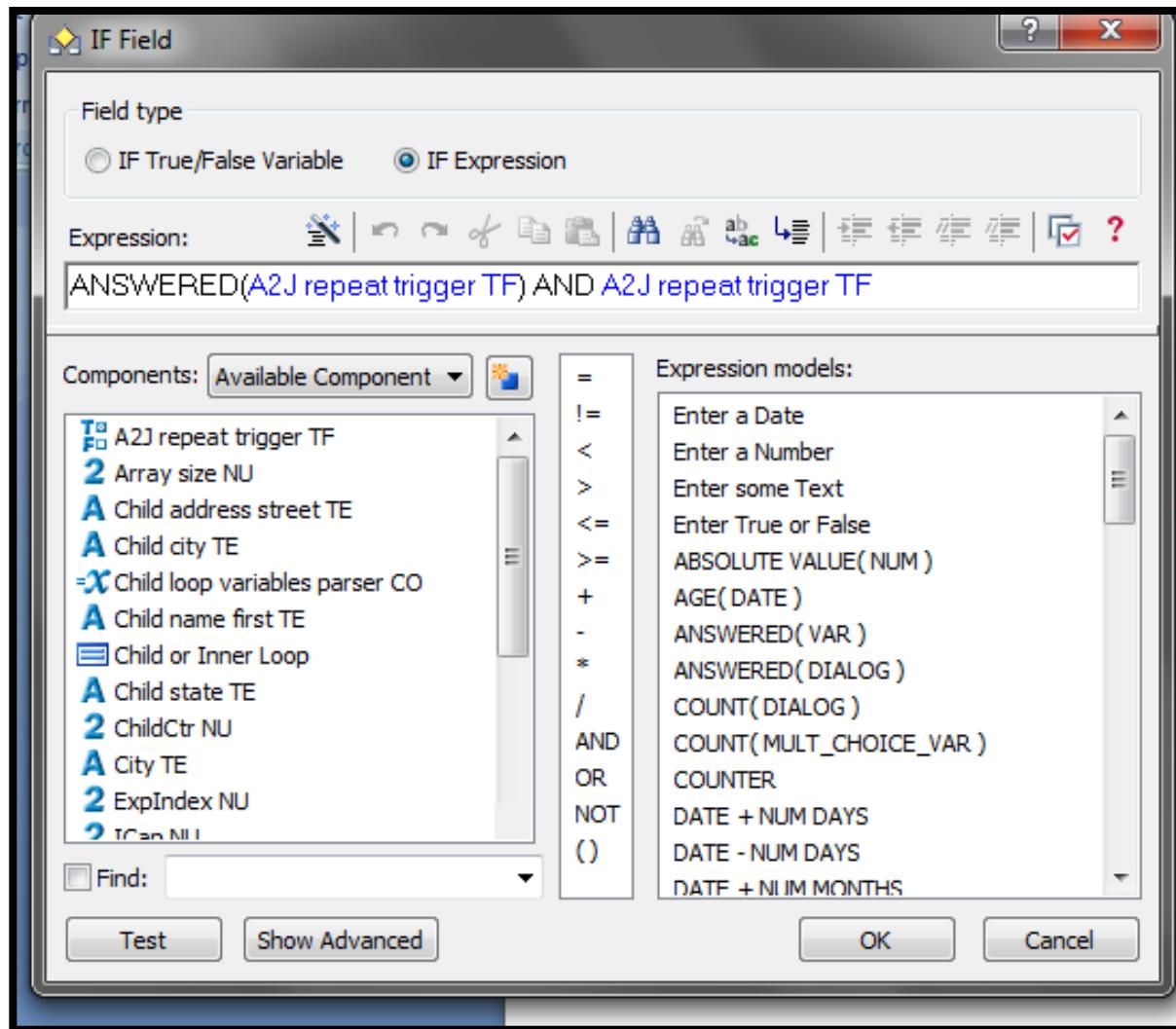
|  |                             |                    |                  |
|--|-----------------------------|--------------------|------------------|
|  | «HD Child Prior Address TE» | «HD Start Date TE» | «HD End Date TE» |
|--|-----------------------------|--------------------|------------------|

«END REPEAT»

«END REPEAT»



# The HotDocs Component



# The HotDocs Component

Child loop variables parser CO - Computation Editor [Text] - Nested Repeat Loops Example.cmp

Properties Locals Advanced Resource Used In Notes

Variable name: Child loop variables parser CO Default format:  Non-breaking

Script:

```
SET ParentCtr NU TO 1
SET ChildCtr NU TO 1
SET ExplIndex NU TO (ParentCtr NU * Array size NU) + 1
WHILE ParentCtr NU <= OutsideCount
    WHILE ChildCtr NU <= ICap NU[ParentCtr NU]
        SET HD Child Prior Address TE[ParentCtr NU, ChildCtr NU] TO Child prior address TE[ExplIndex NU]
        SET HD Start Date TE[ParentCtr NU, ChildCtr NU] TO Start date TE[ExplIndex NU]
        SET HD End Date TE[ParentCtr NU, ChildCtr NU] TO End date TE[ExplIndex NU]
        SET HD current address TE[ParentCtr NU, ChildCtr NU] TO Current address TE[ExplIndex NU]
        INCREMENT ExplIndex NU
        INCREMENT ChildCtr NU
    END WHILE
    INCREMENT ParentCtr NU
    SET ChildCtr NU TO 1
    SET ExplIndex NU TO (ParentCtr NU * Array size NU) + 1
END WHILE
```

Variable Field

Variable type:  Computation

Variable: Child loop variables parser CO

Merge field properties: Format:   Non-breaking

Field width:  Align answer:  Fill character:

Unanswered text:

Font:

Comment:

OK Hide Advanced

Components: Available Components

- A2J repeat trigger TF
- 2 Array size NU
- Child age CO
- Child birth year TE
- Child current address TE
- Child loop variables parser CO
- Child name first TE
- Child name full CO
- Child name last TE

Find:

Instruction models:

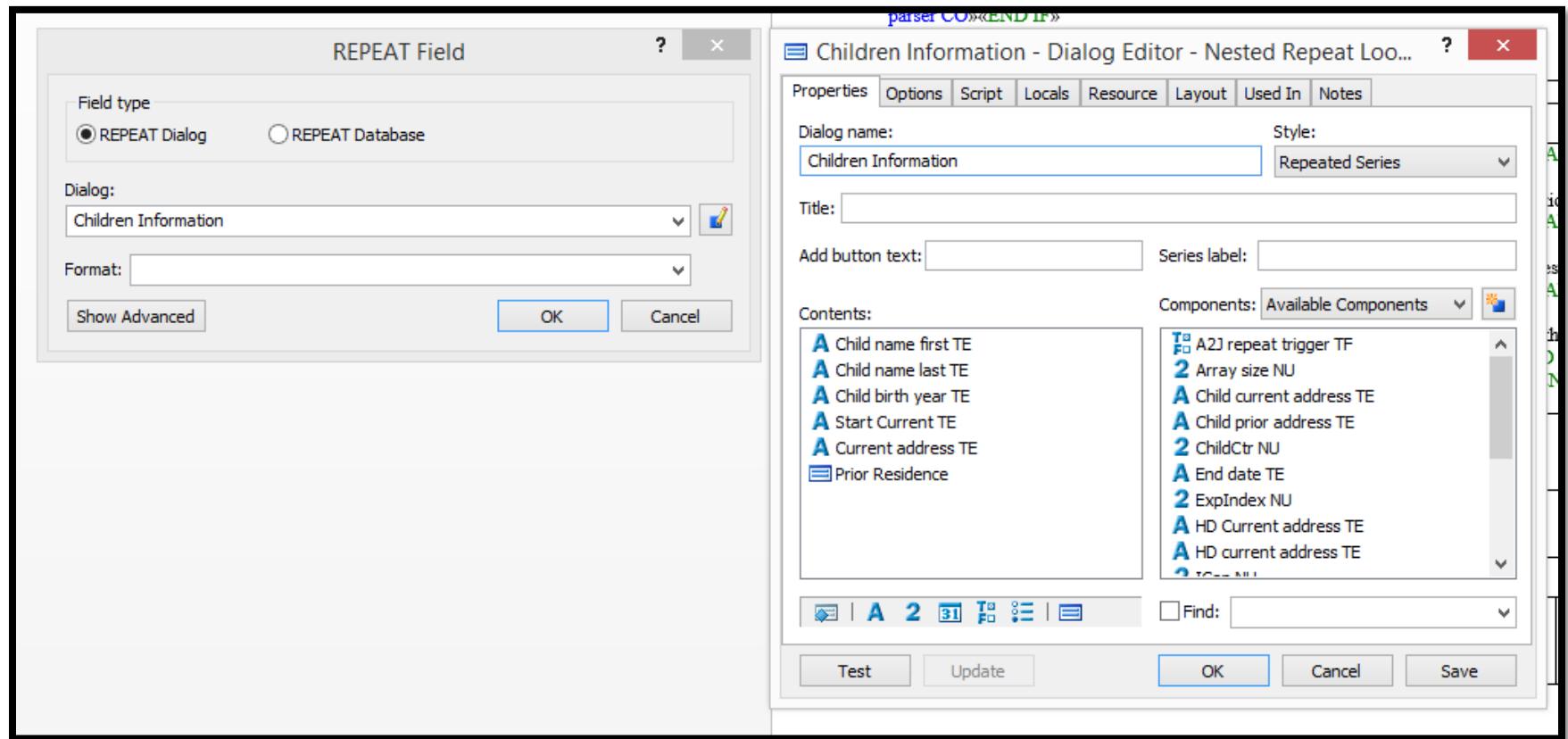
- ADD TEXT TO MULT\_CHOICE\_VAR
- ASCEND VAR
- ASK DATABASE

Expression models:

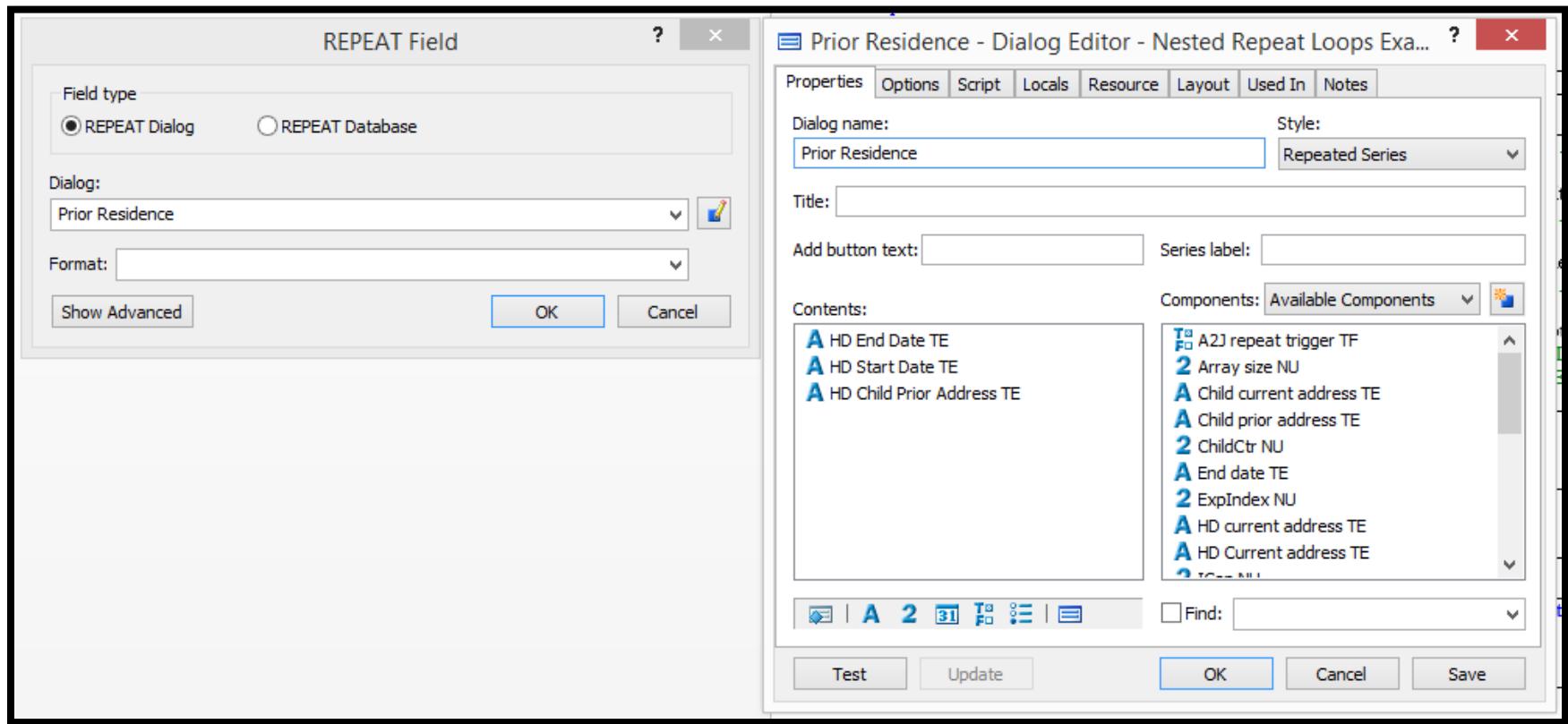
- Enter a Date
- Enter a Number
- Enter some Text
- Enter True or False
- ABSOLUTE VALUE( NUM )
- AGE( DATE )

Test Update OK Cancel Save

# The HotDocs Component



# The HotDocs Component



# DEMO



# Questions or Feedback?

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