TRANSANA and Chapter 8 Retrieval

Chapter 8 in *Using Software for Qualitative Research* focuses on retrieval – a crucial aspect of qualitatively coding data. Yet there are many aspects of this which lead to other things. While looking at one batch of coded data you may want to delve deeper and recode it. There is an aspect of interrogation, for example using filters to examine particular catchments or subsets of data, cutting data in different ways – vertically in one document or horizontally across all. *See all coloured illustrations (from the book) of software tasks and functions, numbered in chapter order.*

Continuity - Horizontal and Vertical cuts – Filtering devices - Recoding- Generating reports - Quantitative outputs

Basic Retrieval of Coded Data with Transana
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8.1 Introduction

Transana offers a variety of ways to explore your coded data set. This document covers the basics of Transana's text-based Reports and graphically-based Maps and Graphs. It also introduces Quick Searches, the simplest form of searching for Keywords in Transana. A discussion of more complex searches using Transana's Search Interface appears in the document relating to Chapter 8.

8.2 Examining Data in Collections

> **See Chapter 9 in *Using Software for Qualitative Research* (pages 214 to 221), also Table 9.4 (Page 223) where discussion focuses on the need sometimes to re-organize things in the software project in order to gather together new or different examples of data, codes, notes etc., to represent aspects of the account or theory that might be emerging.**

As described in Chapter 7 exercise, section 7B.4, one of the ways of indicating analytic meaning while working in Transana is by placing analytic Quotes, Clips, and Snapshots into Collections. As a general rule, Collections represent the most important analytic concepts being explored in the data set. If the concept you want to examine is encapsulated as a Collection, you can begin exploring the data you have analyzed around this concept by examining the appropriate Collection in the Collections Node in the Database Tree.

You can double-click a Quote, Clip, or Snapshot in a Collection and that data item will be loaded in Transana's interface. You can right-click a Collection and select "Play All Clips" to see all of the media-based Clips contained in that Collection, one after another. This allows you to review all of the media data you've identified as being similar (as belonging to the same Collection) to see how well it hangs together and to explore it further.

As you are exploring Clips in a Collection, questions may arise about what occurred before the selected Clip or what happened afterwards. Such questions about the context of a Clip are easily explored by right-clicking the Clip and selecting "Locate Clip in Episode." This function loads the Episode from which a Clip was taken, positions the media file at the point where the clip began, and highlights the Clip's transcript in the source Episode Transcript as well as possible. At this point, reviewing the media file contents on either side of the initiating Clip is easy. Quotes have a similar "Locate Quote in Document feature. Snapshots that have been associated with Episodes also have a similar function, called "Load Snapshot Context," which loads the location in the media file the snapshot has been associated with. Finally, Snapshots that are not in Edit mode are in Exploration Mode. In this mode you can change the zoom and framing of the snapshot, as well as manipulate the display of the detail coding on the Snapshot without making permanent changes to the saved version of the Snapshot. This is useful for exploring the context of a still image, particularly for images that are cropped to emphasize a particular aspect of the image.

A common activity when analyzing media data in Transana involves exploring the contents of a Collection and re-categorizing the Quotes, Clips, and Snapshots found there. For example, a researcher doing a Grounded Theory-based exploration of a classroom might create a Collection called "Questions", where clips of questions that occur in the classroom are gathered during early phases of the analysis. Upon examining the Clips collected there, the researcher might observe that the students and the teacher use questions very differently, and so would create sub-collections (called Nested Collections in Transana) called "Student Questions" and "Teacher Questions." The Teacher Questions, upon further exploration, might be sub-divided into several different types that demonstrated different ways the teacher worked to get the students to explore the topics begin discussed and advance their learning. The researcher could then move the clips into the appropriate nested Collections as a primary analytic activity. In this type of analysis, an expanding Collection structure in Transana and the developing theory coming out of the qualitative analysis go hand in hand.
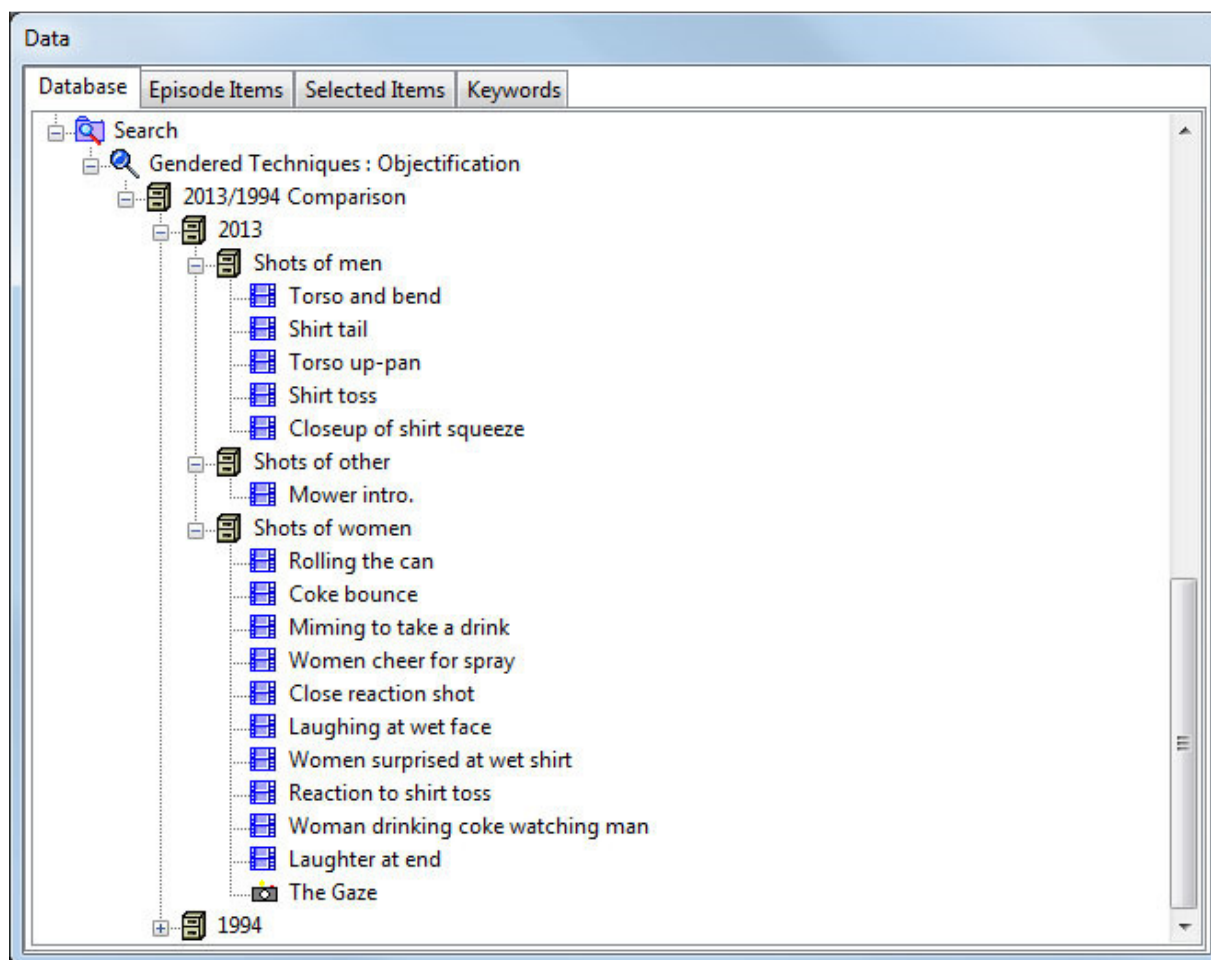
8.3 Quick Search

One of the analytic advantages of using Collections is that relevant Quotes, Clips, and Snapshots are already gathered together in one place when it's time to examine them. When using Keywords to signify analytic categorization, you need to perform a Search to gather the appropriate Quotes, Clips, and Snapshots together for you before you can begin to explore the data.

Let's look at what we have coded with the Keyword "Gendered Techniques : Objectification" in chapter 7 exercises, section 7B. This code was applied to clips across a number of Collections. Since we want to look for only a single code, Transana's Quick Search is perfect. We can initiate a Quick Search by right-clicking the desired keyword in the Database window and selecting "Quick Search" from the menu.
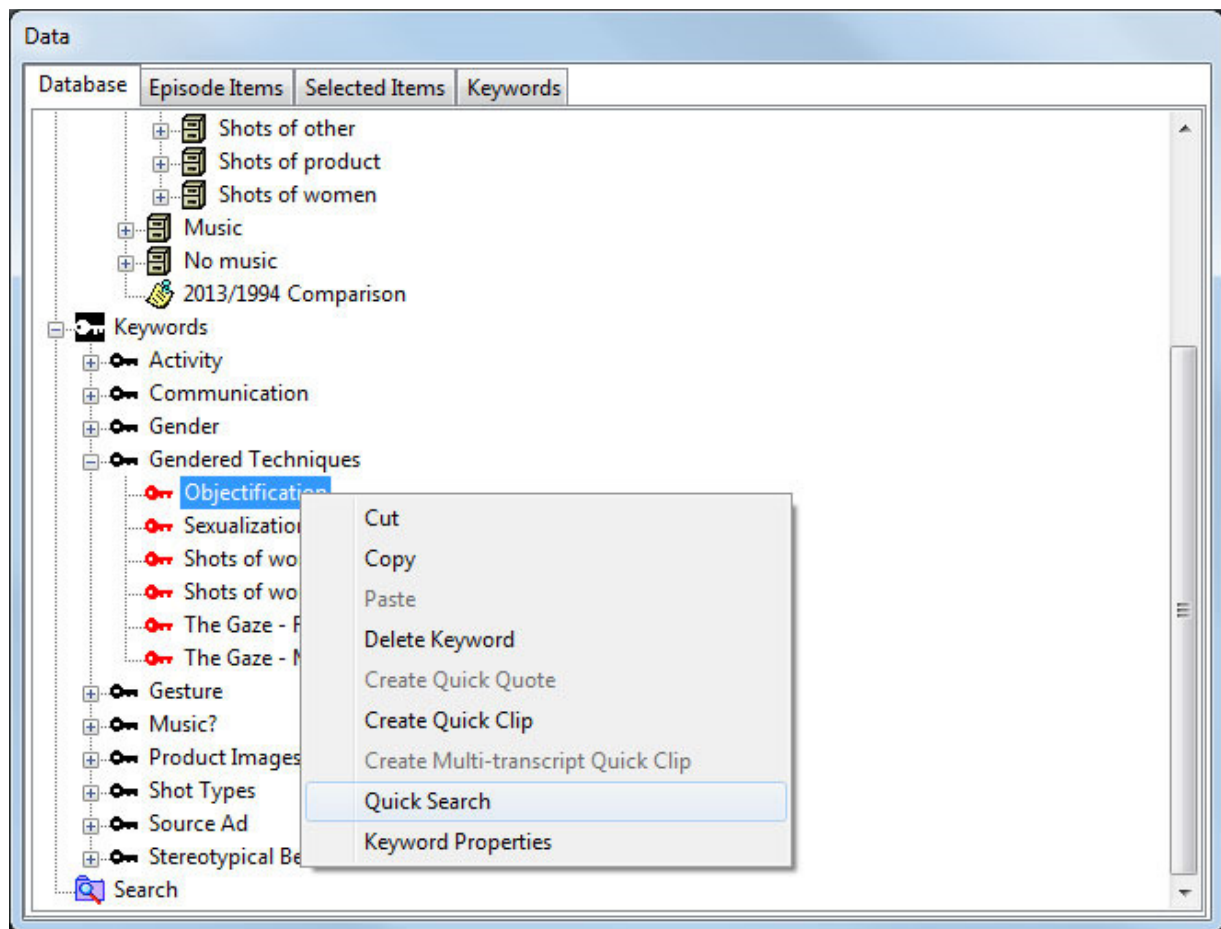
This gives the following results, which appear in the Database Tree's Search node:

You can see that Transana returns Quotes, Clips, and Snapshots, arranged in Collections, as the result of the Quick Search request. The Search Results node acts just like a regular Collection, except that Search Results are not permanent in Transana. You can double-click Quotes, Clips, and Snapshots to load them in Transana's main interface. You can right-click objects in a Search Result to request Reports and Play All Clips. You can use "Locate Quote in Document," "Locate Clip in Episode," and "Show Snapshot Context".

You can rename and re-organize items and drop false positive results using "Drop from Search Result" from several of the right-click menus. None of this will affect the original data that was searched to create this Search Result. (Please note, however, that if you load a Quote, Clip, or Snapshot from a Search Result, changes in coding WILL affect the originating data object. It is work on the Search Results node in the database tree that is not permanent.) The notion is that you sometimes need to manipulate data a bit to figure out whether a given search has produced meaningful results, but that you don't want to harm your permanent data by doing so.
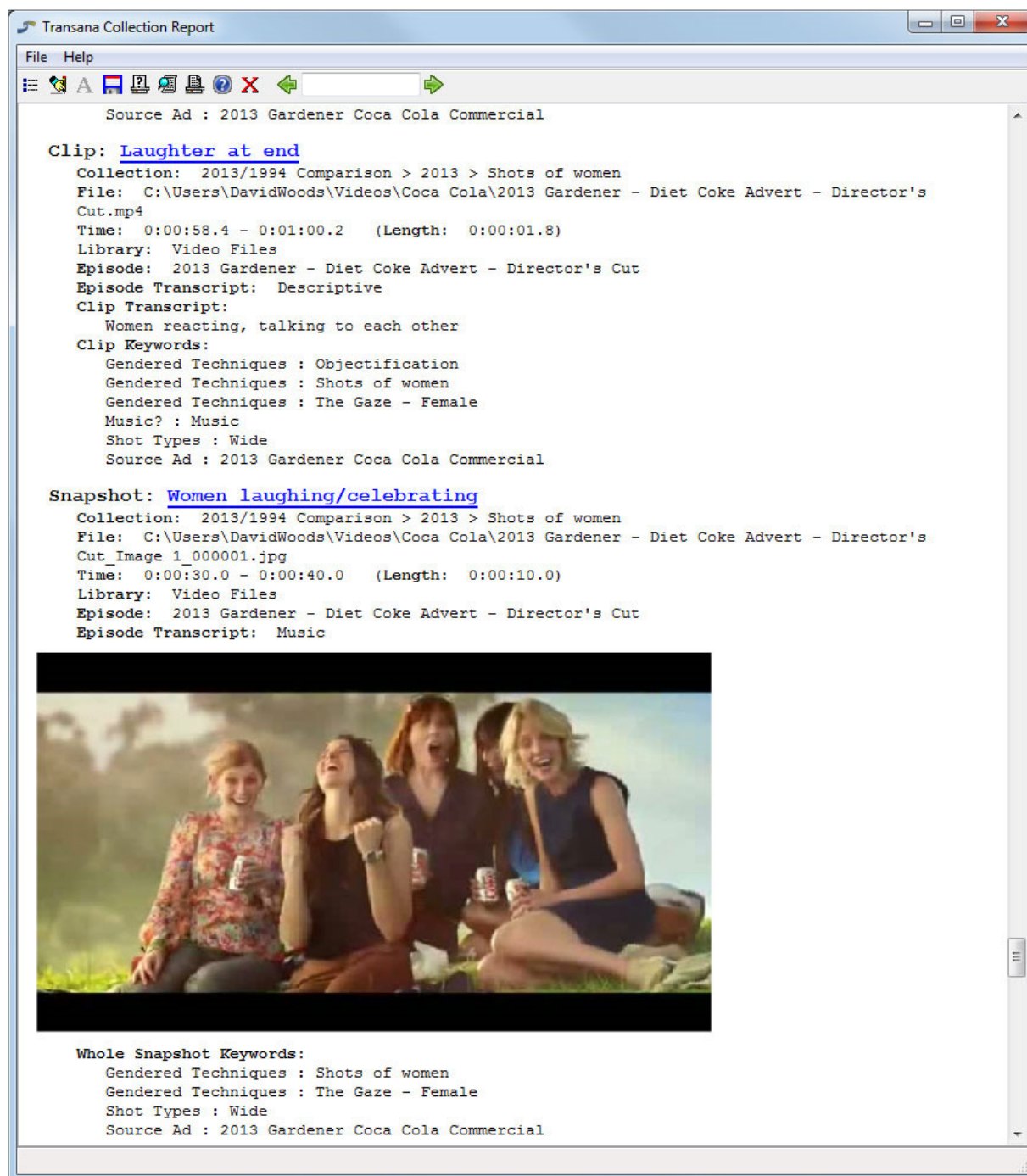
If you do discover something important within a search result, one option you have is to embody that discovery in a Collection by converting the (manipulated) Search Result node into a permanent Collection. You can accomplish this by right-clicking the main node for a given Search Result, called "Gendered Techniques : Objectification" in this example, and select

"Convert to Collection" from the popup menu. When you do this, copies of all of the analytic artifacts displayed in the Search Result are made and added to the project database.

8.4 Collection-based Reports and Maps
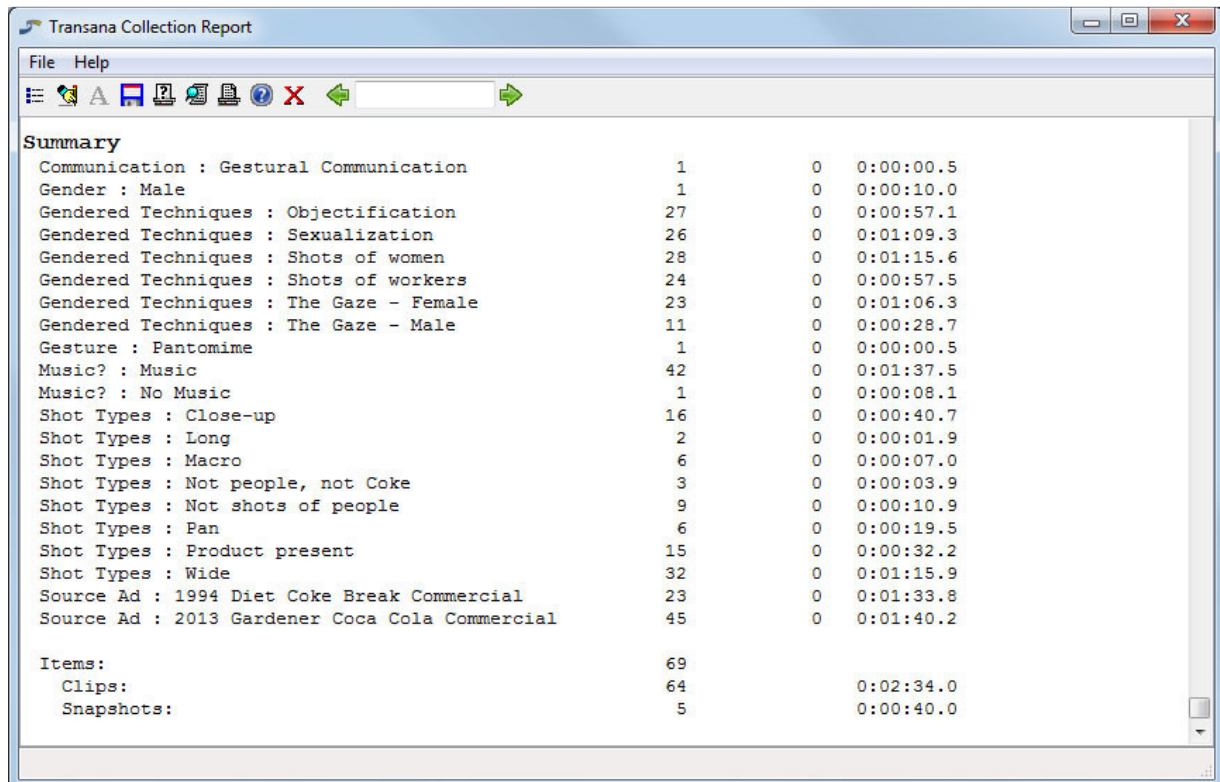
<div style="border:1px solid">

There are a number of ways to examine information about the coding you have done with your data. First, let's look at the information available about Quotes, Clips, and Snapshots in Collections, data gathered together by analytic meaning regardless of source media file. Silver and Lewins refer to this as "Horizontal Retrieval" of data (for example, see pages 19-20 and 195-199).

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To generate a text-and-image-based report with general information about all of the Quotes, Clips, and Snapshots gathered together in a given Collection, right-click the Collection and select the "Collection Report" menu item. If you want this report for all Quotes, Clips, and Snapshots in all Collections, you can initiate this report from the main Collections root node in the database tree (although generating this report on a large database can be time-consuming.) You can also generate the "Search Collection Report" by generating the report based on a Collection in a Search Results Node.

Transana Collection Report — File Help

Source Ad : 2013 Gardener Coca Cola Commercial

Clip: Laughter at end
Collection: 2013/1994 Comparison > 2013 > Shots of women
File: C:\Users\DavidWoods\Videos\Coca Cola\2013 Gardener - Diet Coke Advert - Director's Cut.mp4
Time: 0:00:58.4 - 0:01:00.2 (Length: 0:00:01.8)
Library: Video Files
Episode: 2013 Gardener - Diet Coke Advert - Director's Cut
Episode Transcript: Descriptive
Clip Transcript:
Women reacting, talking to each other
Clip Keywords:
Gendered Techniques : Objectification
Gendered Techniques : Shots of women
Gendered Techniques : The Gaze - Female
Music? : Music
Shot Types : Wide
Source Ad : 2013 Gardener Coca Cola Commercial

Snapshot: Women laughing/celebrating
Collection: 2013/1994 Comparison > 2013 > Shots of women
File: C:\Users\DavidWoods\Videos\Coca Cola\2013 Gardener - Diet Coke Advert - Director's Cut_Image 1_000001.jpg
Time: 0:00:30.0 - 0:00:40.0 (Length: 0:00:10.0)
Library: Video Files
Episode: 2013 Gardener - Diet Coke Advert - Director's Cut
Episode Transcript: Music

Whole Snapshot Keywords:
Gendered Techniques : Shots of women
Gendered Techniques : The Gaze - Female
Shot Types : Wide
Source Ad : 2013 Gardener Coca Cola Commercial

Transana will generate a report with a variety of details about all Quotes, Clips, and Snapshots in the selected scope, the Collection used to initiate the report. The image above shows a single Clip record and a partial Snapshot record from a report made up of the 64 Clip records and 5 Snapshot records used to analyze the Gardener ad.

If appropriately configured, the Collection Report includes a very basic Summary section at the end of the report.

The report's Filter Dialog allows significant customization of the report. You can select what data elements to include in the report, as well as what Quote, Clip, Snapshot, and Keyword information to include.
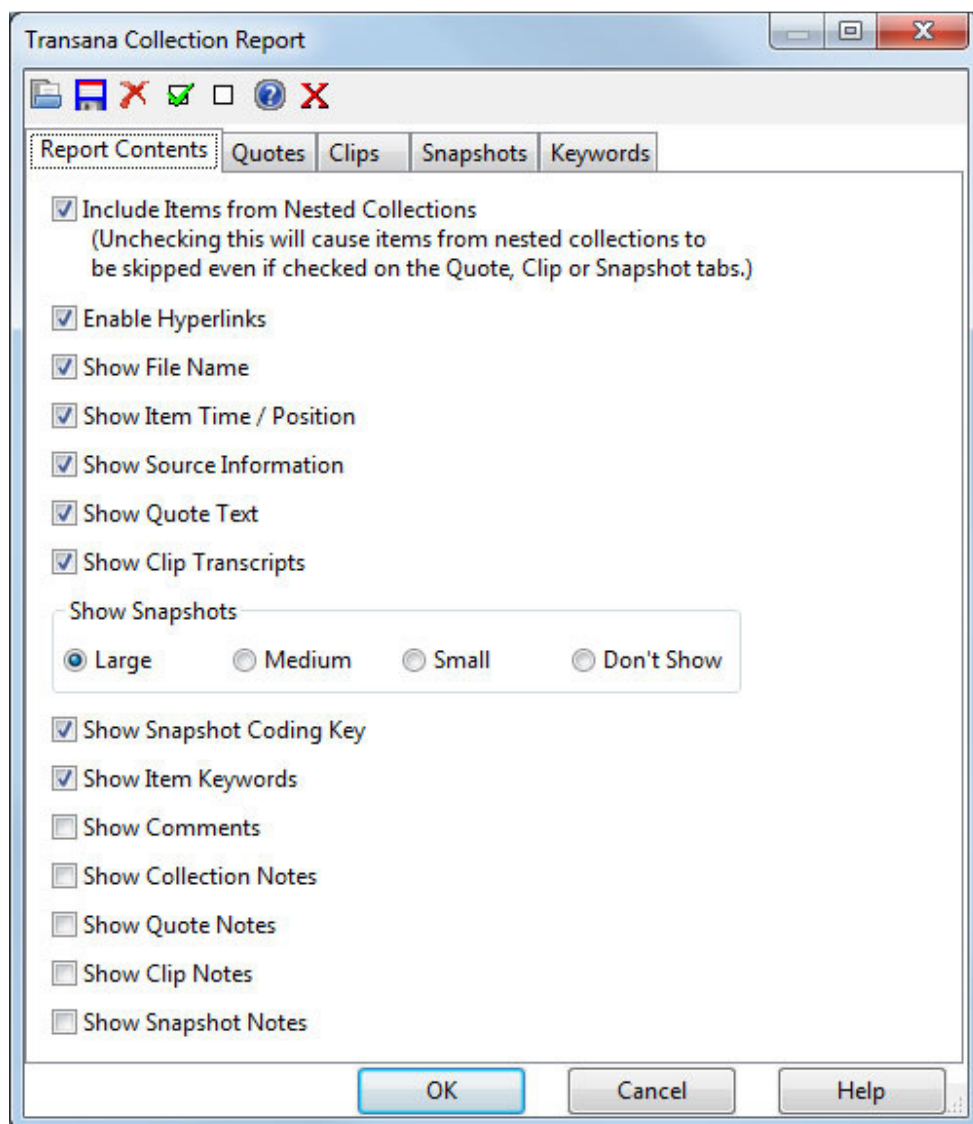
The Filter Dialog allows you to save your filter configurations. This allows you to create a custom view of your data, which can easily be loaded and used in the future. This allows you to easily repeat the embodied analytic view as your analysis proceeds and your data changes.

If so configured, each Quote, Clip, and Snapshot record in the report includes a hyperlink, which loads the requested data object into Transana's main interface for further exploration, allowing you to stay extremely close to your source data. The report can be edited by hand if needed, and can be exported as a Rich Text Format document that can be loaded into a Word Processor. (Quote, Clip, and Snapshot hyperlinks are not exported, as they require Transana's infrastructure to function correctly.)

A graphical report called the Collection Keyword Map shows the patterns of coding in all clips within a given Collection. Please note that the horizontal axis of this report is an artificial time line created as if all clips were placed end to end and is not interpretable.
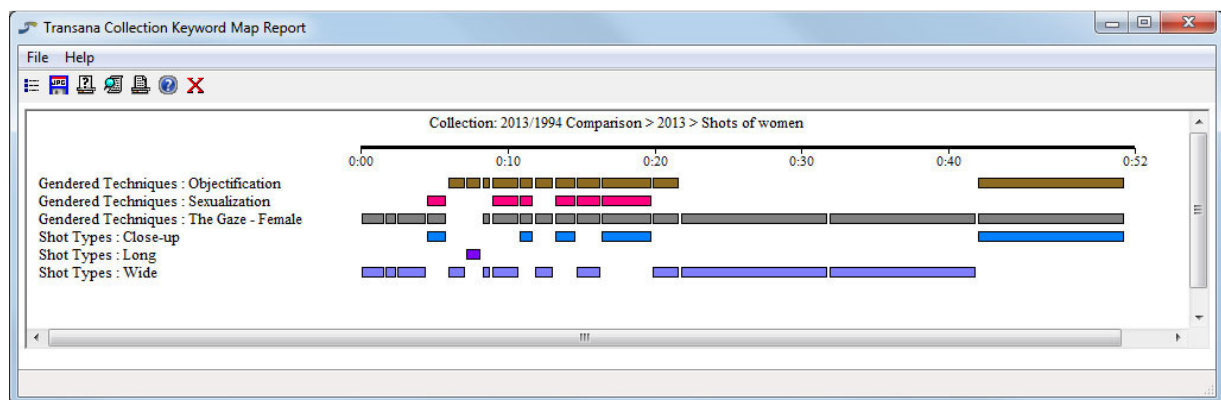
This example, from the Gardener ad, allows us to see the dominance by the Keyword "Gendered Techniques: The Gaze – Female" in our "Shots of Women" Collection and to see that close-up shots are often associated with Objectification and Sexualization in this commercial. Clicking on a bar in this report loads the underlying Quote, Clip, or Snapshot object into Transana's main interface, allowing easy exploration of report elements in the source data. This report can be exported to JPG format for inclusion in analytic write-ups, articles, and reports using the "Save as JPG" button in the report's toolbar.

Saving a report to a JPG image allows you to save a snapshot of your data analysis at a particular point in time during your analytic process. The image is exactly the same every time you view it. In contrast, saving a Filter Configuration allows you to create an analytic view or lens on your data set. When you load that Filter Configuration at a later time, the report may be different, reflecting changes you have made in your data. Both of these can be useful in the analytic process.

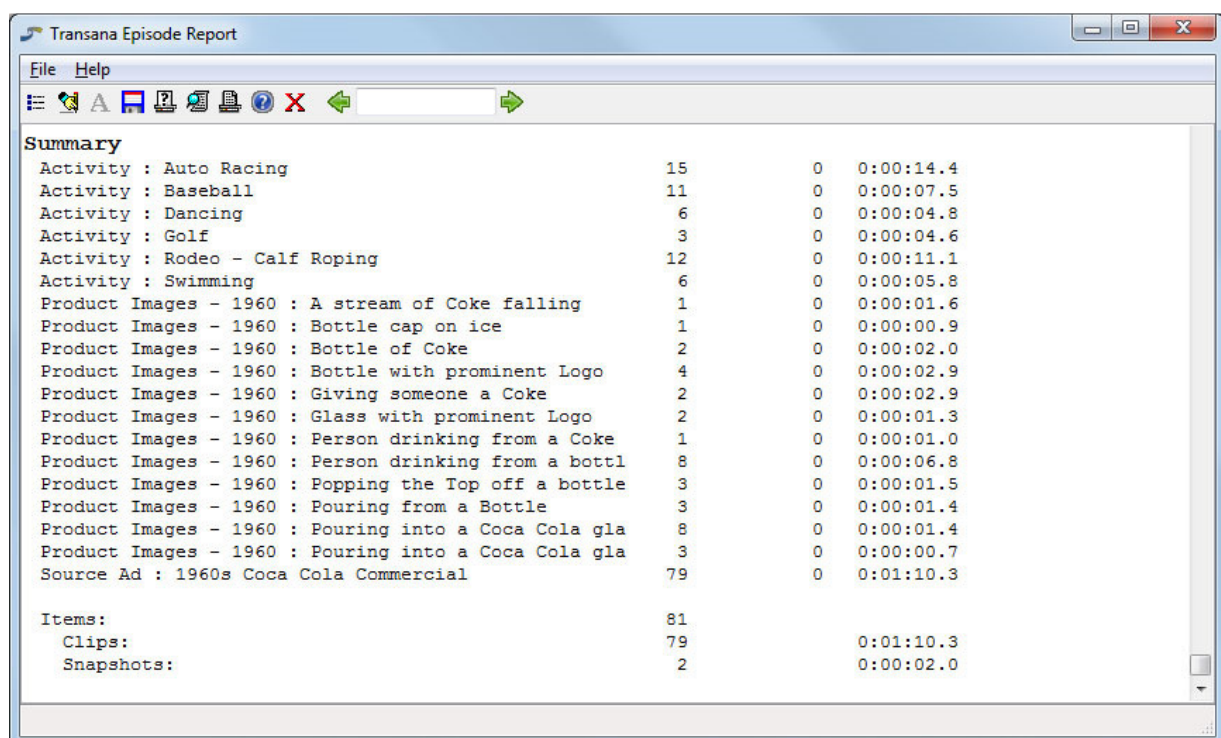### 8.5 Episode-based Reports, Maps, and Graphs

Now let's look at the information available about Clips and Snapshots taken from or associated with Episode, data derived from the same source media file regardless of how it is used analytically within Transana's Collection structure. Silver and Lewins refer to this as "Vertical Retrieval" of data

To generate a text-and-image-based report with general information about all of the Clips and Snapshots taken from or associated with a particular Episode record, right-click the Episode and select the "Episode Report" menu item. (There is an equivalent report called the "Document Report" for text data, but we'll focus on video for this example.)

This report is almost identical in form to the Collection Report described above. It selects and gathers data completely differently, but displays it in an identical format with very similar options and functionality, including the Summary section and in the Filter Dialog.

Let's right-click the 1960s Coca Cola commercial, selecting "Episode Report" from the menu. This shows us all Clips created from this Episode and all Snapshots associated with this Episode, regardless of what Collection these Clips and Snapshots are placed in. This lets us explore in detail exactly how these data items are used in our analysis.

Now let's scroll down to the Summary section of this report.

Here, we see a number of interesting things. First, looking at the Activity codes, we see that auto racing is the most frequently presented activity, both in terms of number of clips and in terms of total time. (Transana presents both measures of usage for each Keyword.) This is followed by calf roping, baseball, swimming, dancing, and golf. A little quick calculation shows that 53 of

79 clips, or 49.2 seconds of this 60 second ad, include either an activity or (as we recall how we coded this ad) a scene of one of the activity participants enjoying an icy cold Coke. If we're interested in analyzing gender across all ads, we can also note that 12 of 53, or 10.6 seconds of the 49.4 seconds total, is devoted to female athletes and their activities.

There are a number of graphical reports available based on source media file. Similar to the Collection Keyword Map described above, you can right-click the Episode you would like to examine and click the 'Episode Keyword Map' menu item. This creates a report where the horizontal axis represents the time line of the source media file showing coding applied to the file across time. Unlike the Collection Keyword Map, this time line is meaningful and interpretable. Clicking any of the bars representing Keywords will load the corresponding Clip in Transana's main interface. The Filter Dialog controls many aspects of the appearance of the Map, and you can export the image to a graphics file by pressing the "Save to JPG" button in the upper left-hand corner of the Keyword Map window.

The same information we saw in the Episode Report Summary can be presented graphically by right-clicking the 1960s Coca Cola commercial and selecting "Episode Keyword Map" from the menu. A little manipulation using the Filter Dialog (as described earlier) allows us to produce the following graph.
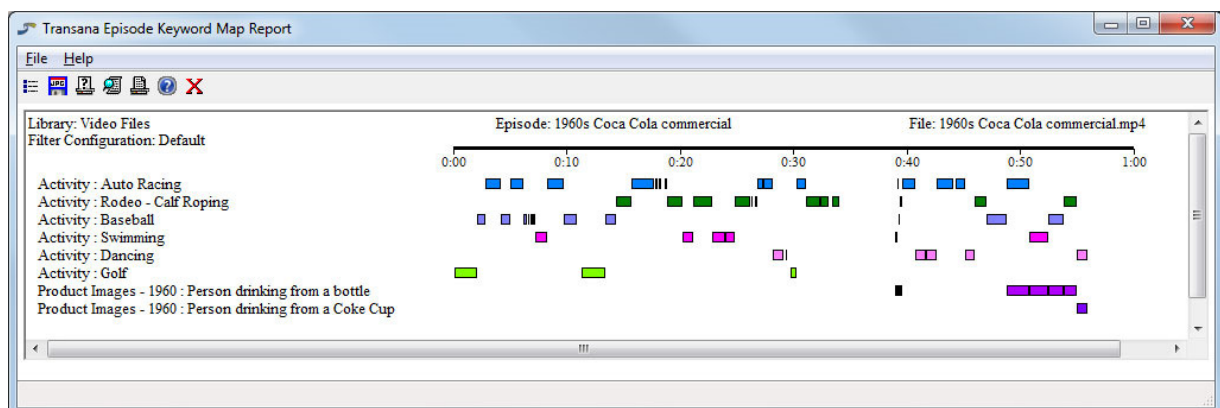

This allows us to see the "pattern" of coding across the time line of the video, seeing for example that golf was only displayed in the first half of the ad while auto racing was dispersed across the whole ad. We may also note that all of the shots in about the final 25% of the ad show athletes drinking Coke rather than participating in their activities. Further, we can see the two activities pursued by women, coded in shades of pink, and compare that to the activities pursued by men, coded in blues and greens, ignoring the codes about drinking coded with purples to see the relative presentation of men and women in this ad.

You may notice that the Keyword Map is very similar to the Keyword Visualization. If you want to print or save a Keyword Visualization, use the Keyword Map instead.

If you right-click a Library record, you will see a number of report options designed to present information from multiple related source files that have been placed in the same Library.

The Library Keyword Sequence Map presents an identically-formatted Keyword Map for each Episode in a Library, all in a single report. We can use the Filter Dialog to pare it down to just the Episodes we would like to analyze. If we save our filter configuration using the name 'Default', this filter will automatically be applied when the report is created again. (Deleting the default filter configuration can restore it to its original state.)

We wanted to represent some of the differences between our 'Gardener' commercial and its precursor, a 1994 advertisement named 'Diet Coke Break,' of which 'Gardener' is a spiritual sequel. We transcribed and coded the two videos, and used the Library Keyword Sequence Map to represent them side-by-side.
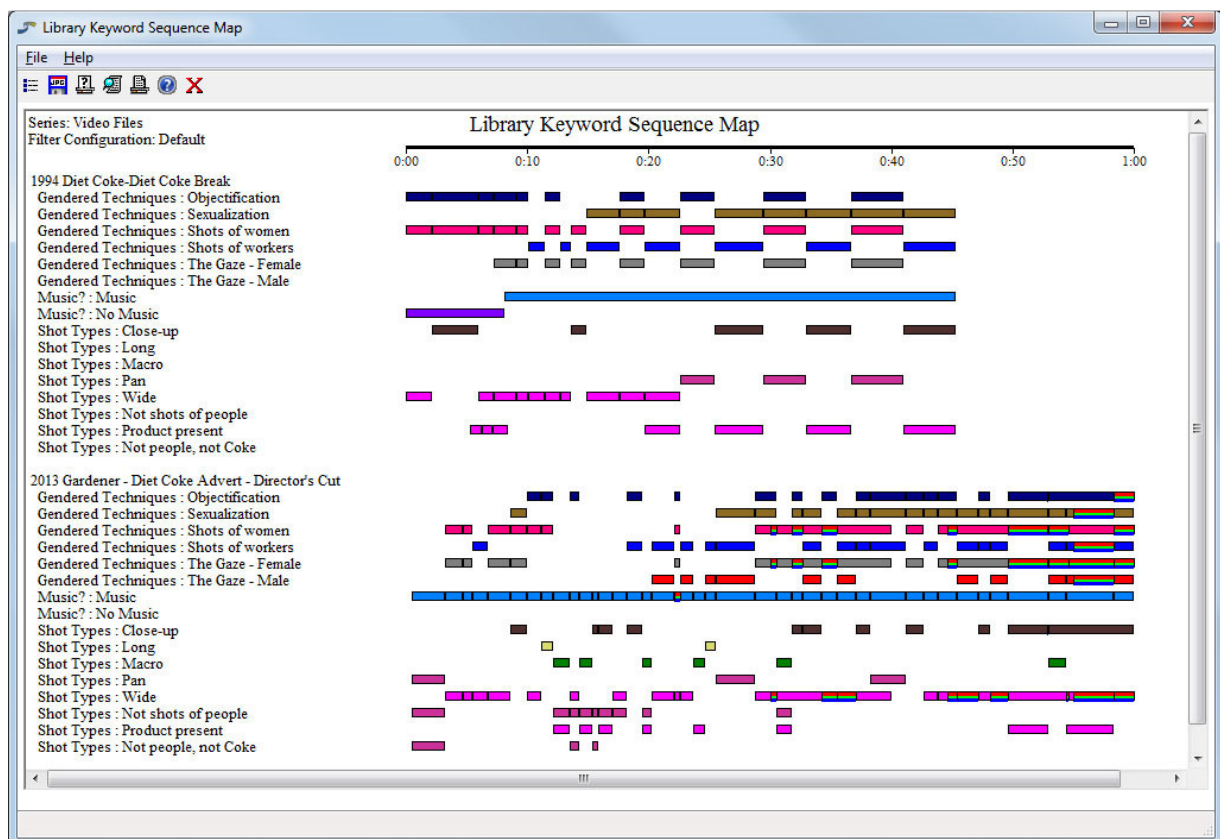
The configuration itself was easy to build. Simply uncheck all Episodes but the two we are using, or use Transana's Uncheck All feature and recheck the two you need manually.
The same goes for our Keywords, which can also be recolored on this screen by selecting a Keyword and assigning it a new color below.
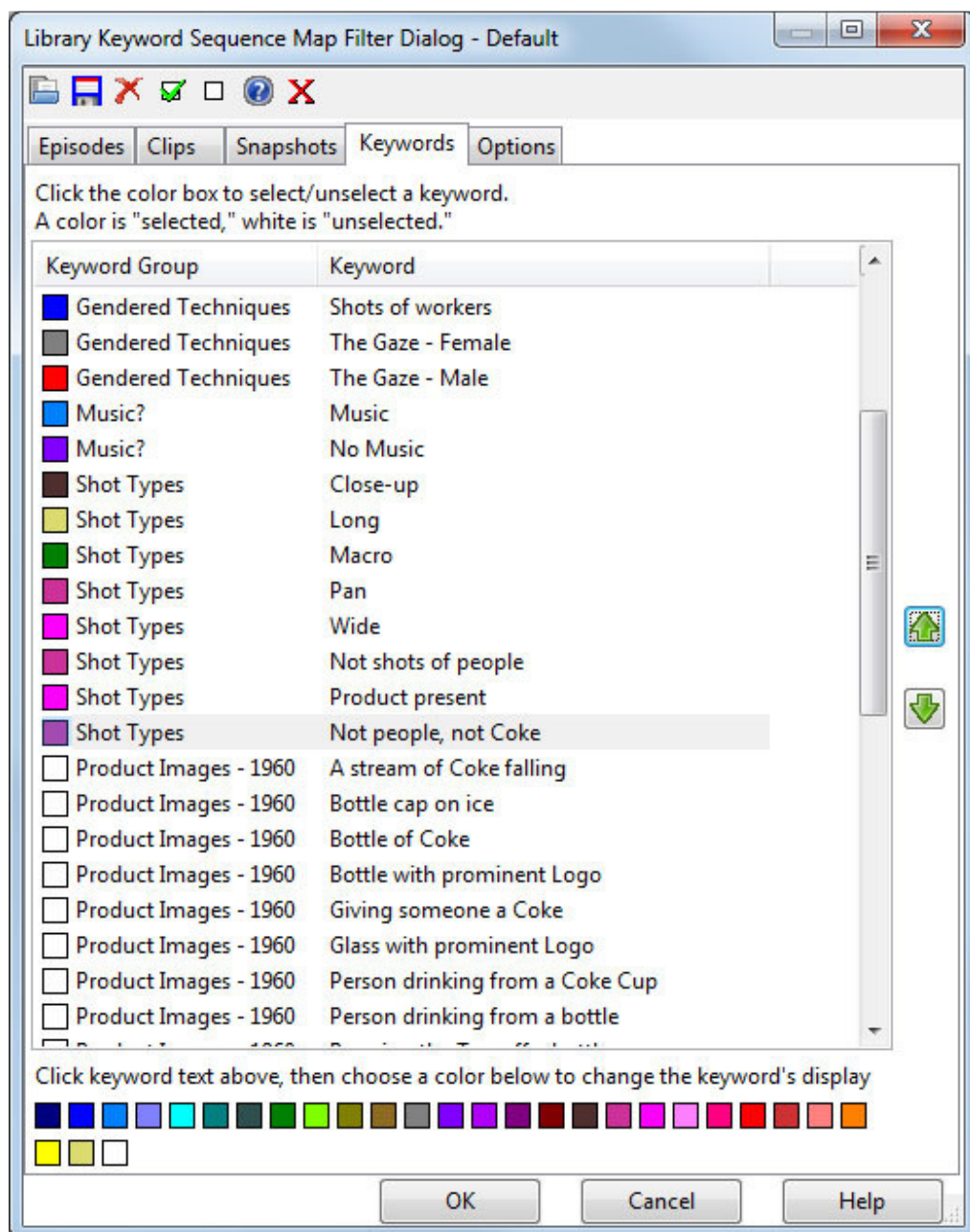
There are many interesting things to notice in this graphical report. For just one example, take a look at the coding of "Gendered Techniques : The Gaze – Female" and "Gendered Techniques : The Gaze – Male" in the two media files. In 1994, the male gaze was not present, as the man in the commercial did not know he was being watched, while in 2013, we see an interplay of the male and female gaze as the characters in the ad look at each other and interact. This difference is ripe for theoretical interpretation, to say the least.

But suppose that, instead of wanting to see how our coding plays out over time, we would rather get either concrete or percentage-based representations of the amount of time a Keyword is

present. This can be achieved by the other two Library Keyword visualizations, namely the Library Keyword Bar Graph and Library Keyword Percentage Graph.

The Library Keyword Bar Graph displays cumulative seconds of coded time, aggregated for each keyword. We used the Filter Dialog to examine only these two ads and their Keywords.
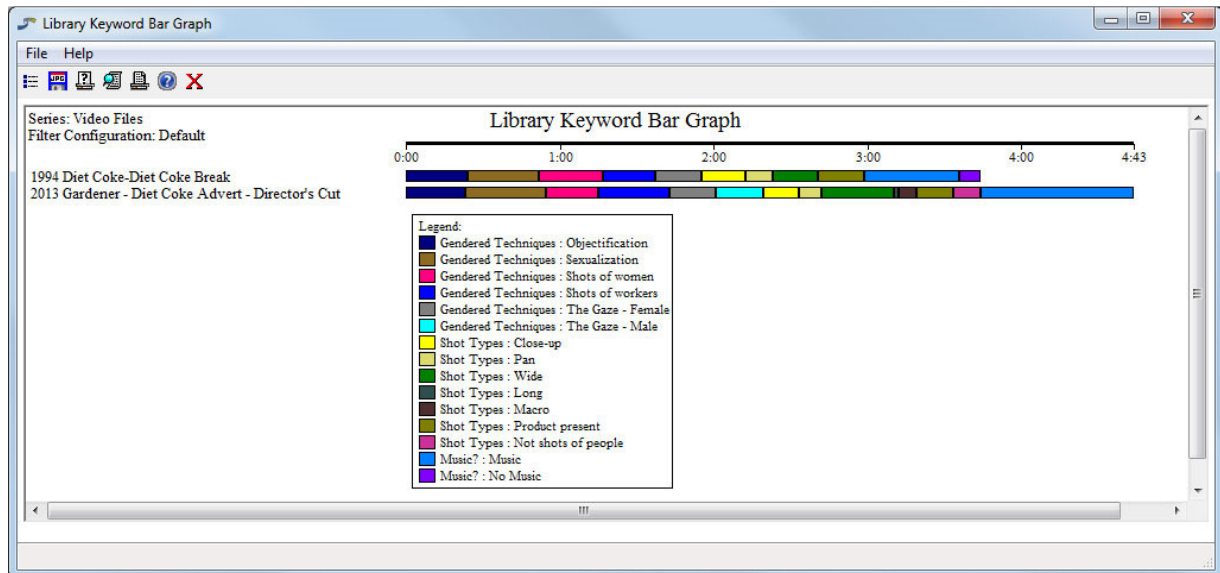

This view is a very useful one for comparative examination. For example, in the 60-second 'Gardener' commercial, we can see that Coca-Cola is on screen for 10.7 seconds. Simply hover your mouse over the bar corresponding to the code "Shot Types: Product Present" to show the amount of time coded for that Keyword.
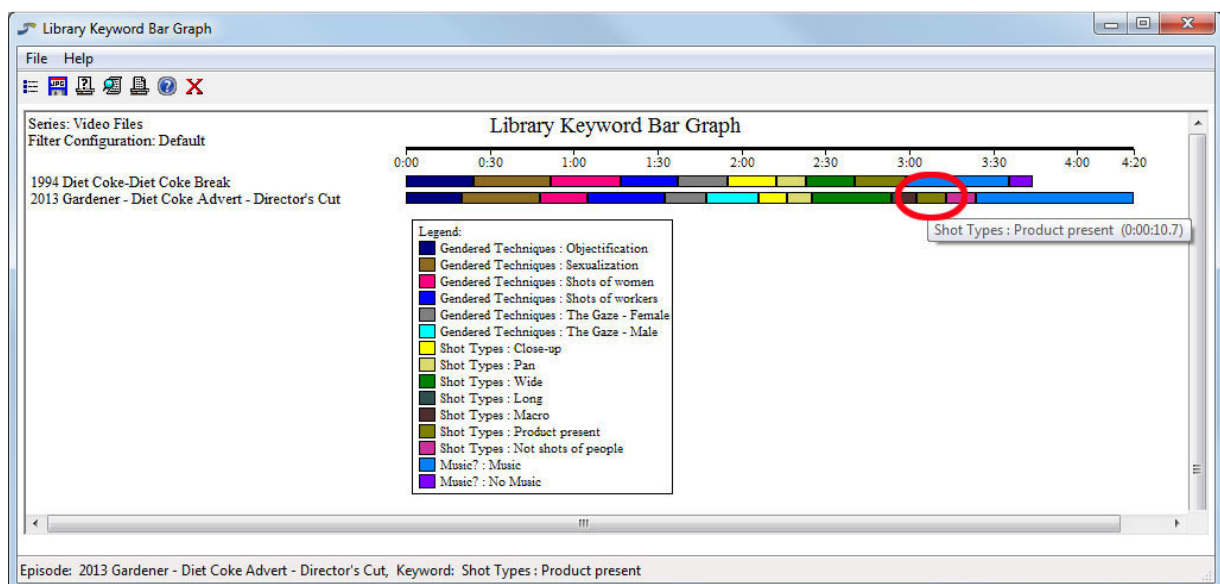
The 'Diet Coke Break' advertisement, however, features 18.1 seconds of Coke—either symbolically or literally—over its 45 second runtime. This difference is worth some additional consideration and theoretical interpretation.
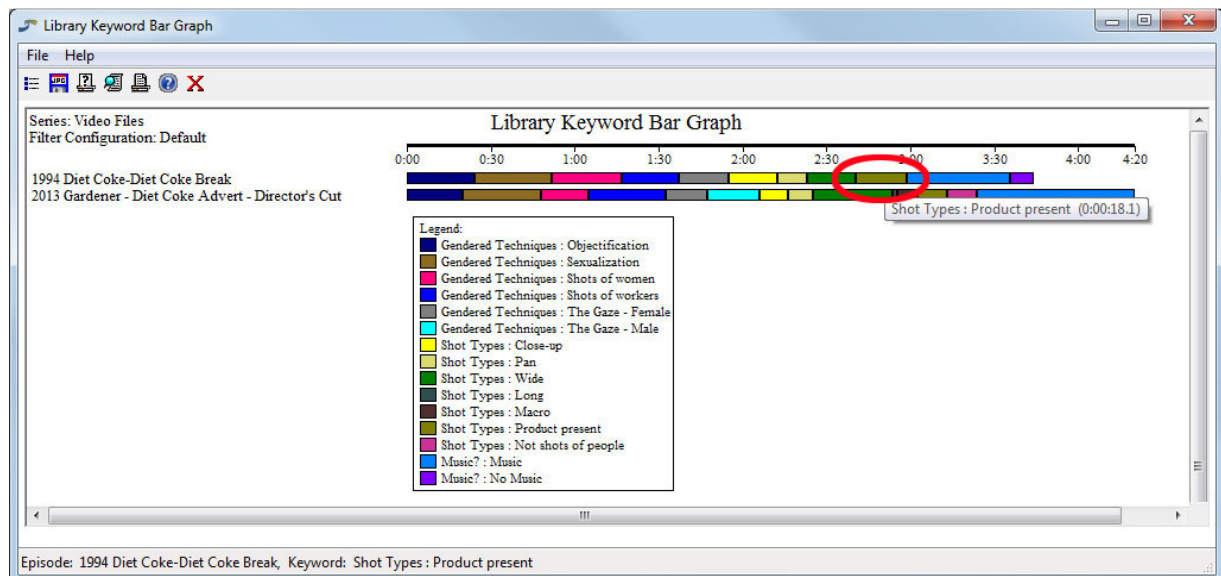
The Bar Graph only gives us aggregate seconds of coding, however. In addition, any overlapping Clips recoded with the same Keyword will influence the time presented in this Graph. If we wish to see relative proportions of Keyword coding, we can instead use the Library Keyword Percentage Graph.
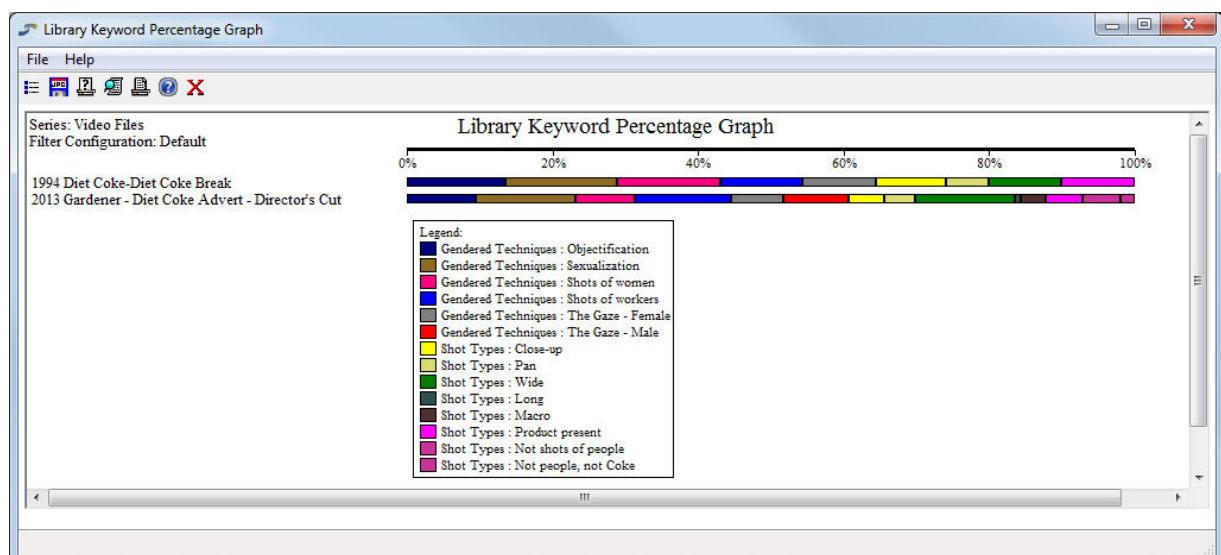
For example, with some careful reduction of our Filter to include only mutually-exclusive codes, in the following image we can see the relative proportions of each commercial in which women are on screen—and see a difference not apparent from the relatively equal-looking bars on the Bar Graph.
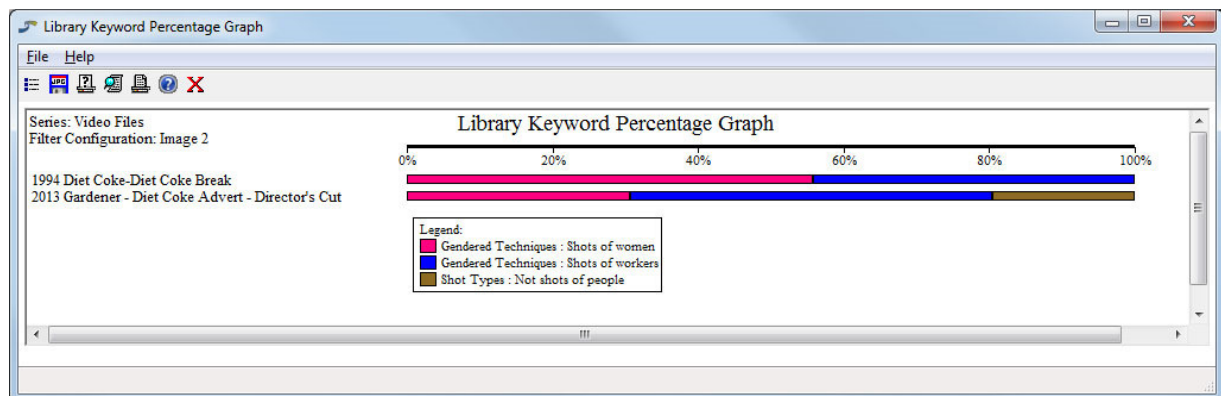
We see less time (as a percentage of the entire ad) spent showing the women in the 2013 ad compared to the 1994 ad. The percentage of time spent on men stays the same, and the difference appears to be made up of shots that are not of people at all, something we didn't see at all in 1994. Looking at the shots coded as not being of people might help us figure out how to interpret this shift over time.

The Percentage Graph has some downsides, though. In order to use it, we must understand that its percentages represent percentage of total coded time presented in the graph, not percent of the length of the media file. This means that any Clips with multiple codes or any overlapping Clips will skew the percentages and make them less meaningful. In order to prevent this, ensure that your filters are configured very carefully.

At any stage in your work it will be necessary to cycle between the creation of clips, coding and writing to keep track of subtle insights and progress <u>see Chapter 10 exercises next</u>.