

## APA Citation for Videos and Analytics in the VMC.

### Videos

Videos in the VMC, whether raw videos or video clips created from raw videos are cited in the following manner:

*Title of Video* [video file]. Retrieved from DOI

Examples:

*A28, Night Session, Pascal's Identity (presentation view), Grade 11, May 12, 1999, raw footage* [video file]. Retrieved from <http://dx.doi.org/doi:10.7282/T3319TTG>

The screenshot shows the VMC Search Portal with the following details:

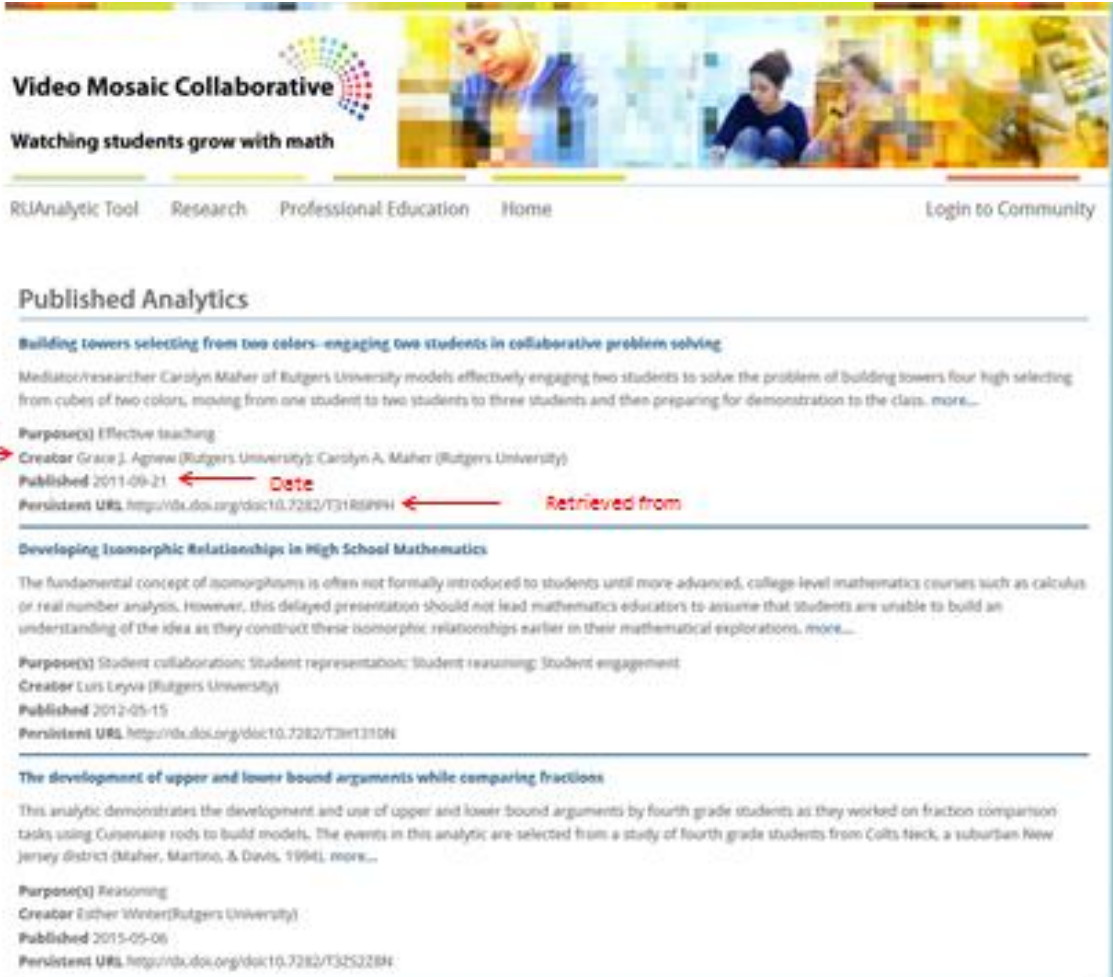
- Page Header:** Video Mosaic Collaborative, Watchling students grow with math. Navigation: HOME, TEACHER EDUCATORS, RESEARCHERS AND STUDENTS, TEACHERS, RESEARCH. Search bar: SEARCH THE WEBSITE.
- Search Results:** VMC Search Portal, General - Results. 1 of 313 | Next =
- Selected Item:** A28, Night Session, Pascal's Identity (presentation view), Grade 11, May 12, 1999, raw footage. Duration: 01:00:58. Publisher: New Brunswick, NJ; Robert B. Davis Institute for Learning. c1999-05-12. Persistent URL: <http://dx.doi.org/doi:10.7282/T3319TTG>.
- Description:** In this full-session, raw footage video, students have come to school in the evening for a night session. The group, made up of Jeff, Michael and Romina begin discussing why the coefficients of the binomial expansion, specifically (a+b) to the 10th power. In attempting to explain why 45 is the coefficient of the third term in this expansion, the students refer to counting how many 10-tall towers have exactly two cubes of a specific color. As they are joined by another member, Ankur, they discuss the formula for "n choose x" using factorial notation and what the factorial symbol means. When asked to explain "why you multiply," Ankur responds by making use of an analogy of counting the number of ways to arrange three different colors. They then investigate the reason for dividing n! by (n-x)! and x! when calculating "n choose x." In explaining the specific example of "5 choose 2," they use the analogies: of arranging five people on a line when you are concerned about the positions of only two of the people and counting the number of 5-tall towers having exactly two cubes of one color. They then discuss the notation for combinations, which they called "choose" notation, and how it relates to Pascal's Identity (the addition rule for Pascal's Triangle). Michael describes how the third row of Pascal's Triangle can be written in "choose notation" (1 3 3 1 becomes "3 choose 0, "3 choose 1, "3 choose 2," and "3 choose 3"). He and the other students explain how the answers to the 3-topping pizza problem are related to row 3 of Pascal's Triangle, and how a specific instance of Pascal's Identity can be understood as generating specific 4-topping pizzas from 3-topping pizzas. The researcher then asks the students to write Pascal's Triangle in this notation, including a general row (row n). The students then explain to Brian, a late-comer, the meaning of Pascal's Identity (the addition rule for Pascal's Triangle) in terms of operations on the pizzas that are represented by specific entries in Pascal's Triangle. They write Pascal's Identity in general form using standard notation.
- Notes:** "Choose" notation is the notation for counting the number of combinations: "n choose r" gives the number of ways of selecting subsets containing r objects from a set containing n objects. When counting combinations, the order of selection is irrelevant. "N choose r" is equal to n!/[(n - r)!r!]. The n-tall towers problem is: How many towers n cubes tall is it possible to make when there are two colors of cubes to choose from? The n-topping pizza problem is: How many pizzas can be made when there are n different pizza toppings to choose from?
- Math Tool Calculator:** Available for the video.
- Left Sidebar:** PDF (1), Transcript (1:00:48), VIDEO, Quicktime Vfd, Citation & Export (circled in red), Related Resources (1), View Analytics (1), Statistics, Complete Record (0), R.I. An Access Service.
- Annotations:** Red arrows point to the Title, Publisher, and Persistent URL. Red text says "Title Retrieved from" with arrows pointing to the title and the URL. A red circle highlights the "Citation & Export" link, with red text below it: "An APA citation is provided at this link".

### Analytics

Analytics are video files combined with scholarly analysis. Analytics are authored by one or more researchers and are cited in the following manner:

Last Name, First & Middle Initials. (Year, Month Day). *Title of video* [Video file]. Retrieved from DOI

Agnew, G.J. and Maher, C.A. (2011, September 21). *Building towers selecting from two colors--engaging two students in collaborative problem solving* [video file]. Retrieved from <http://dx.doi.org/doi:10.7282/T31R6PPH>



**Video Mosaic Collaborative**  
Watching students grow with math

RIAAnalytic Tool   Research   Professional Education   Home   [Login to Community](#)

### Published Analytics

**Building towers selecting from two colors--engaging two students in collaborative problem solving**  
Mediator/researcher Carolyn Maher of Rutgers University models effectively engaging two students to solve the problem of building towers four high selecting from cubes of two colors, moving from one student to two students to three students and then preparing for demonstration to the class. more...

**Author(s)** → Purpose(s) Effective teaching  
Creator Grace J. Agnew (Rutgers University); Carolyn A. Maher (Rutgers University)  
Published 2011-09-21 ← **Date**  
Persistent URL <http://dx.doi.org/doi:10.7282/T31R6PPH> ← **Retrieved from**

---

**Developing Isomorphic Relationships in High School Mathematics**  
The fundamental concept of isomorphisms is often not formally introduced to students until more advanced, college-level mathematics courses such as calculus or real number analysis. However, this delayed presentation should not lead mathematics educators to assume that students are unable to build an understanding of the idea as they construct these isomorphic relationships earlier in their mathematical explorations. more...

Purpose(s) Student collaboration; Student representation; Student reasoning; Student engagement  
Creator Luis Leyva (Rutgers University)  
Published 2012-05-15  
Persistent URL <http://dx.doi.org/doi:10.7282/T3H131DN>

---

**The development of upper and lower bound arguments while comparing fractions**  
This analytic demonstrates the development and use of upper and lower bound arguments by fourth grade students as they worked on fraction comparison tasks using Cuisenaire rods to build models. The events in this analytic are selected from a study of fourth grade students from Colts Neck, a suburban New Jersey district (Maher, Martino, & Davis, 1994). more...

Purpose(s) Reasoning  
Creator Esther Weber (Rutgers University)  
Published 2015-05-06  
Persistent URL <http://dx.doi.org/doi:10.7282/T32S22BH>