

**Title of Session:** Beyond Penguins and Polar Bears

**Moderator:** Kimberly Lightle

**Title of File:** 20090708penguins

**Date:** July 8, 2009

Room: Beyond Penguins Group

**KimberlySL:** Hi everybody - just getting everything ready to go

**KimberlySL:** I'm back - nice group!

**JeffC** joined the room.

**SusanR:** indeed

**JeffC** waddles into the room.

**BJB2:** A reminder again to go to Actions in the top right of the chat and select DETACH to make it easier to read the scrolling chat

**SusanR:** saw your table session, Kimberly

**BJB2** wonders if Jeff needs to go out and play more baseball?!

**SusanR:** it was buzzing

**JeffC:** nah... half hour was enough... just waddling like a penguin now to get into the mood.

**KimberlySL:** waddles???

**SusanR** . o O ( wonders if you are getting as much rain as we are in Ontario )

**KimberlySL:** of all places to run into BJ - at a bar...

**JoseVG:** I have a friend coming in one minute I hope.

**LaurenF** joined the room.

**KimberlySL:** let me clarify - it was a reception at NECC that just happened to be at a bar - ha

**JoseVG:** hi Lauren

**JeffC:** it's a bit grey today... but no rain.

**LaurenF:** Hello :D

**SusanR:** an Elluminate reception

**KimberlySL:** Hi Susan!

**SusanR:** we met!!

**SusanR:** too

**KimberlySL:** we did - I remember!

**KimberlySL:** Hi everyone - let's introduce ourselves

**BJB2:** please tell Kim where you are located and what you teach or hope to teach

**GinaG:** I am located in Staten Island, Ny. I teach Kindergarten

**SusanR:** Sue from Ottawa, Ontario. I offer the K to 3+ Great Resources sessions here at TI

**DialaF:** STATEN ISLAND. teaching UPK

**BJB2** realizes you are here to fulfill an assignment, but I know you will be thrilled with what you learn during this session!

**GinaG:** Great

**JoseVG:** I am Joe I teach in LA humanities

**LaurenF:** Lauren - I teach in LA, Math

**KimberlySL:** I'm a science educator at the Ohio State University - Beyond Penguins is one of my National Science Foundation funded projects

**JoseVG:** Nice

**KimberlySL:** What a great group - I will assure you that even though BP is designed for K-5 everyone will learn a lot!

**DialaF:** OF COURSE

**KimberlySL:** We've been using Tapped In to introduce issues of the Beyond Penguins and Polar Bears Integrating Literacy and Science online magazine

**KimberlySL:** Because it is such an important topic, we're going to go back and re-visit the issue from October 2008 – Energy and the Polar Environment - <http://beyondpenguins.nsd.org/issue/index.php?date=October2008>. This will be home base.

**BJB2:** hold down your ctrl key when you click on the url

**KimberlySL:** So when I say "go home" please go to the above URL

**GinaG:** ok

**BJB2:** this overrides your pop up blocker...or turn off your pop up blockers

**KimberlySL:** BTW - we've had 14 issues so far - each of the issues has a different science theme and literacy strategy but all issues are laid out exactly the same

**BJB2:** uh oh, Kim: Requested Issue (October2008.) is not available at this time.

**KimberlySL:** everything is online and free

**KimberlySL:** <http://beyondpenguins.nsd.org/issue/index.php?date=October2008>

**KimberlySL:** let's try again...

**BJB2:** ahhh...much better!

**KimberlySL:** great - geesh

**BJB2** checks to see if everyone got that url?

**DialaF:** it is not working

**KimberlySL:** the pink polar bear - one of my favorite images

**KimberlySL:** try <http://beyondpenguins.nsd.org/issue/index.php?date=October2008>

**LaurenF:** I can't get the link to work

**JoseVG:** got it

**DialaF:** me too

**GinaG:** should we click it now

**BJB2:** are you holding down ctrl? If you are and it doesn't work, hold down SHIFT

**KimberlySL:** click on the last link I provided

**DialaF:** shift is not working too

**LaurenF:** I got it, I clicked on the link in the main Penguin page

**BJB2:** then open a new browser, go to Actions in the top right of the chat and select Send to Pasteboard...

**KimberlySL:** another way to get to all the issues is go to <http://beyondpenguins.nsd.org> and scroll down - click on the pink polar bear

**BJB2:** then copy the url and paste it into the new browser window

**KimberlySL:** Gina - were you able to get to the page?

**GinaG:** What do u do after u click the polar bear?

**DialaF:** what polar bear?

**GinaG:** It is in the sun

**KimberlySL:** The homepage image of issue 7 is a polar bear

**DialaF:** okay thank you

**JoseVG:** got it

**LaurenF:** got it

**KimberlySL:** the issue title is Energy and the Polar Environment - all with me?

**KimberlySL:** oh good

**JoseVG:** yes

**DialaF:** got it

**KimberlySL:** Look at the page for a couple of seconds – you'll see departments and columns. Each issue of the magazine is laid out the same way. You can get to all the previous issues by clicking on Archive at the top of the page in the header.

**GinaG:** yes

**JoseVG:** I see it

**KimberlySL:** there are five departments with column titles under the depts - science content knowledge, misconceptions, etc.

**KimberlySL:** I want to start with the word albedo – have any of you heard of it before? BTW – the “e” is pronounced as a long “e.”

**DialaF:** nope

**GinaG:** no

**LaurenF:** no

**JoseVG:** no

**KimberlySL:** Well - let's learn something about it - click on the Science Content Knowledge column under the Professional Learning Department

**JoseVG:** he proportion of the incident light or radiation that is reflected by a surface, typically that of a planet or moon.

**KimberlySL:** good definition!

**KimberlySL:** the url of the actual article is <http://beyondpenguins.nsd.org/issue/column.php?date=October2008&departmentid=professional&columnid=professional!science>

**JoseVG:** oxford dictionary

**KimberlySL:** Once the sun's energy reaches earth, it is intercepted first by the atmosphere. A small part of the sun's energy is directly absorbed, particularly by certain gases such as ozone and water vapor.

**KimberlySL:** Some of the sun's energy is reflected back to space by clouds and the earth's surface.

**KimberlySL:** Most of the radiation, however, is absorbed by the earth's surface. When the radiation is absorbed by a substance, the atoms in the substance move faster and the substance becomes warm to the touch. The absorbed energy is transformed into heat energy.

**KimberlySL:** Look at the third image – you can see a visual of this process.

**KimberlySL:** Now read the next section – REFLECT OR ABSORB? OK – what’s albedo? (In your own words)

**LaurenF:** albedo is the part of the radiation that is bounced back into space and not taken

into the Earth (and warming it)

**GinaG:** How much energy is absorbed

**DialaF:** the radiation reflect into space by an object

**JoseVG:** A reflected percentage of solar rays by an object

**KimberlySL:** good - so if an object has a high albedo (around .7) what does that mean?

**LaurenF:** the higher the number means more is reflected back to space

**KimberlySL:** great

**DialaF:** more radiation is reflected

**GinaG:** more energy

**KimberlySL:** so think about what is happening to earth's energy budget when white ice/snow melts

**JoseVG:** higher the number more is reflected

**KimberlySL:** more energy is absorbed leading to higher temperatures which means more ice melts, etc

**GinaG:** not good

**KimberlySL:** the cycle is pictured in the last image on that page

**CamilleL** joined the room.

**DialaF:** I see

**KimberlySL:** Hi Camille - welcome

**CamilleL:** hi there!

**KimberlySL:** we are looking at issue 7 of Beyond Penguins - <http://beyondpenguins.nsd.org/issue/index.php?date=October2008>

**KimberlySL:** Can you think of places in your curriculum where you teach this concept?

**KimberlySL:** maybe you don't use the term albedo - but energy absorption and reflection?

**JoseVG:** Maybe with hunters and gatherers...

**JoseVG:** Comparing the earth the way it was...

**KimberlySL:** Go back to the issue page:

<http://beyondpenguins.nsd.org/issue/index.php?date=October2008>. Click on Lessons and Activities under Science Literacy. The lessons have been categorized by K-2 and 3-5. We've included lessons that integrate literacy.

**JoseVG:** With the way it is now.

**KimberlySL:** Good idea Jose

**SusanR:** Understanding Life Systems

**GinaG:** Is that on the home page

**JoseVG:** thank you

**KimberlySL:** go back to the homepage and click on Lessons and Activities under the department Science and Literacy

**LaurenF:** I could use the albedo to look at positive and negative numbers in my math classrooms

**JoseVG:** yeah Lauren

**KimberlySL:** Lauren - good idea - you could also use it when you are teaching percentage

**LaurenF:** or decimals too! :D

**KimberlySL:** aren't fractions a wonderful thing!

**KimberlySL:** back to the issue page -

<http://beyondpenguins.nsd.org/issue/index.php?date=October2008>

**KimberlySL:** Find the department Science and Literacy - click on the link that says Lessons and Activities

**KimberlySL:**

<http://beyondpenguins.nsd.org/issue/column.php?date=October2008&departmentid=literacy&columnid=literacy!lessons>

**DialaF:** okay

**JoseVG:** okay

**KimberlySL:** Take a couple minutes and look at a few of the lessons. Come back and share what you've found.

**GinaG:** books and resources

**KimberlySL:** what about a specific activity that really captures your imagination?

**DialaF:** lesson plans

**LaurenF:** I liked the Radiation Lesson - it fits with the 6th grade science standards for California

**GinaG:** I would like to read the story to clarify things

**DialaF:** That mostly everything we have is found in nature

**KimberlySL:** Gina - we have highlighted activities that would work in a K class

**KimberlySL:** we've included both science and literacy lessons (mostly from Read, Write, Think)

**GinaG:** Thanks

**KimberlySL:** Let's keep going - Each issue has a non-fiction expository story written for grades 4-5 by a children's science writer. We take this story and write versions for grades K-1 and 2-3. Go back to the issue page and click on Feature Story under Science Literacy.

**SusanR:** Hot and Cold Colours ..integrates well with math ..readabilty is great for grade 2

**JoseVG:** I saw a lesson on radiation that went into the background of convection and conduction. It was a great to find activities that were very hands on.

**KimberlySL:** Maybe we should wait a second until everybody is back

**DialaF:** got it

**GinaG:** ok

**KimberlySL:** Ok - Each issue has a non-fiction expository story written for grades 4-5 by a children's science writer. We take this story and write versions for grades K-1 and 2-3. Go back to the issue page and click on Feature Story under Science Literacy.



**KimberlySL:** Issue page is the homepage for this issue -  
<http://beyondpenguins.nsd.org/issue/index.php?date=October2008>

**KimberlySL:** The Feature Story link is under the Lessons and Activities link

**JoseVG:** ok

**LaurenF:** That's a great feature, because the students can read the story at their own pace and report back!

**KimberlySL:** Steve's story actually begins Far away from us in the outer reaches... (fourth paragraph). There are printable PDF files and electronic versions of the books.

**DialaF:** great

**KimberlySL:** Steve is the children's story writer

**GinaG:** very helpful

**JoseVG:** nice

**LaurenF:** I like that the students can listen to it and read along

**KimberlySL:** Scroll down and click on one of the electronic book links. Click on the paw to listen to the text being read to you.

**KimberlySL:** click on the play button (up in the right hand corner) - clicking on the paw will turn the page (oops)

**KimberlySL:** BTW - the K-1 version has a fish to click on to turn the page

**SusanR:** outstanding

**JoseVG:** great ELD kids

**JoseVG:** great for ELD kids

**GinaG:** It makes everything so understandable

**KimberlySL:** We have a feature story for each issue of the magazine - we can look at all of them in a minute

**DialaF:** beautiful

**KimberlySL:** Each issue focuses on a literacy strategy – this one focuses on Note Taking. Go back to the issue page and click on Literacy Content Knowledge under

Professional Learning. This article contains templates that can be used with the Feature Story.

**KimberlySL:** homepage is

<http://beyondpenguins.nsd.org/issue/index.php?date=October2008>

**SusanR:** you are reaching all levels and modalities; auditory and visual learners too

**KimberlySL:** Back over to the Professional Learning department and then click on the Literacy Content Knowledge link

**JoseVG:** ok

**LaurenF:** ok

**DialaF:** okay

**GinaG:** good for helping with assessments

**KimberlySL:** if you scroll down to the bottom of the page -

<http://beyondpenguins.nsd.org/issue/column.php?date=October2008&departmentid=professional&columnid=professional!literacy> - you'll see two activities that you can use with the feature story

**KimberlySL:** the ebook feature stories and the second activity look great on a whiteboard

**JeffC:** redirect for the above link: <http://sn.im/notetaking1>

**KimberlySL:** thanks Jeff

**KimberlySL:** I know the URLs of specific articles are huge - that's why I keep asking people to go back to the homepage of the issue!

**JoseVG:** The note it 3 ways is a great active reading strategy.

**CamilleL:** thanks, Jeff.

**KimberlySL:** I wanted to end up at the Virtual Bookshelf. Go back to the issue page and click on virtual bookshelf. Are you familiar with any of these books? go to the Virtual Bookshelf under the Science and Literacy Department

**KimberlySL:**

<http://beyondpenguins.nsd.org/issue/column.php?date=October2008&departmentid=literacy&columnid=literacy!bookshelf>

**GinaG:** not familiar with them but can't wait to get some for my library. Very helpful thanks

**KimberlySL:** we work with school librarians to choose books for every issue - most if not all should be in your school library

**JeffC:** <http://sn.im/literacybookshelf>

**JoseVG:** Not familiar with the book since I am not a science teacher

**KimberlySL:** thank you Jeff

**DialaF:** these are great books

**KimberlySL:** there is a virtual bookshelf for each issue of the magazine

**KimberlySL:** since we have a few more minutes - let's look at another column under the Professional Learning department

**JoseVG:** ok

**KimberlySL:** back to the issue homepage and click on Misconceptions link

**KimberlySL:** we highlight student misconceptions for each issue of the magazine and include a misconception probe that you can use with your students

**KimberlySL:** the probe for this issue is at [http://onramp.nsd.org/eserv/onramp:1241/What\\_Comes\\_From\\_the\\_Sun.pdf](http://onramp.nsd.org/eserv/onramp:1241/What_Comes_From_the_Sun.pdf)

**JoseVG:** ok

**LaurenF:** these activities are very useful

**KimberlySL:** you can see other columns - Integrating Technology, Equity, Teaching and Assessment Strategies, etc.

**CamilleL:** so clearly put together!

**KimberlySL:** there are researcher stories, integrated activities (under the Across the Curriculum department)

**JoseVG:** I could adapt these probing strategies for humanities

**JeffC:** I already had a shortcut for the August 2008 "misconceptions" article: <http://snurl.com/misconceptions>

**KimberlySL:** One last place to look - the header

**JoseVG:** ok

**KimberlySL:** Stories for Students, Browse Columns, Archive, Podcasts, and Change Language

**CamilleL:** this page great for PD

**KimberlySL:** The change language feature allows you to translate the content of the magazine into 14 languages

**JoseVG:** wow

**GinaG:** That is very helpful for ESL

**LaurenF:** That's great for different language parents too

**DialaF:** wow

**JoseVG:** good point Lauren

**KimberlySL:** the archive provides links to all the issues of the magazine

**GinaG:** can't wait to see what other books to get'

**DialaF:** are there any recent issues?

**KimberlySL:** next issue will be available August 1 - icebergs and glaciers

**KimberlySL:** Diala - click on Archive or go to <http://beyondpenguins.nsd.org>

**DialaF:** okay

**KimberlySL:** we are publishing a new issue every other month

**DialaF:** thank you

**BJB2:** You all might be interested in attending the K to 3+ Resources discussion on Tuesday, July 14. The topic is Great Resources and Revelations from NECC 09. Please join Sue Roseman for that discussion (even if you don't HAVE to for an assignment ;-))

**KimberlySL:** latest issue is polar oceans - <http://beyondpenguins.nsd.org/>

**JoseVG:** what is necc stand for

**BJB2:** The next Beyond Penguins and Polar Bears discussion will be on August 5...tell your colleagues!

**BJB2:** NECC = National Education Computer Conference

**JoseVG:** will do

**GinaG:** Thanks for clarifying

**BJB2:** Did this discussion live up to your expectations?

**KimberlySL:** please look at the archive - what issue of the magazine would you like to discuss next month?

**KimberlySL:** <http://beyondpenguins.nsd.org/archive.php>

**GinaG:** Polar Plants looks interesting. Didn't realize plants could live in such conditions

**JoseVG:** tundra life in the polar extremes

**LaurenF:** Polar Patterns Day Night and Seasons looks interesting

**KimberlySL:** you can't imagine how much I've learned! there is an active volcano on Antarctica!

**DialaF:** they are all interesting but I will choose rocks and minerals

**BJB2:** Thanks, Kim...this was a fun group of participants!

**GinaG:** thank you

**JoseVG:** thank you Kim

**DialaF:** thank you

**CamilleL:** I actually contacted the photographer of the Polar Plants -- Henning -- he's a doll!

**KimberlySL:** thank you! what a great group!

**LaurenF:** Thank you for leading the group! :D

**JeffC:** thanks Kim

**CamilleL:** thank you too, Kimberly == valuable website!!!

**KimberlySL:** Please join us next month - looking forward to it! Bye

**JoseVG:** I'm going to bookmark your website and send it to our science teacher

**KimberlySL:** yes....

**GinaG:** bye, thanks again

**LaurenF:** Great - Thank you :D

**BJB2** waves bye and goes to get dinner

**KimberlySL:** good

**JeffC:** <http://sn.im/math2.0> [www\_futureofeducation\_com]

**GinaG:** bye Diala see you Thursday

**DialaF:** bye see you in class

**JoseVG:** Thank you Kimberly and bye to all.