

**DENVER MUSEUM OF NATURE AND SCIENCE**  
**VENUS WINDS PROJECT**  
**MINUTES OF MEETING**

Date/Time/Location: 9 October 2014 6:00 PM Exploration Studio 106

**ATTENDING**

<b>Boudreau</b>	<b>Bullock</b>	Crowl	Diba	Dickerman	Doubek
<b>Farrell</b>	Gehring	<b>Heil</b>	Krider	<b>Lindsay</b>	<b>Logan</b>
McGouldrick	<b>Parziale</b>	Royer	<b>Stewart</b>	<b>Tarr</b>	<b>Trieu</b>
Viera	Zimmerle				

Guests: None

The meeting opened at 6:00 PM at Exploration Studio 106 in the Morgridge Wing. Those **attending** are listed above.

**OLD BUSINESS**

**Individual sub-group task reports**

**Sub-group *Plotting Rotation Curves*** (Proposer: Christy)

Christy's task was to calculate velocity vs. latitude speeds for a solid sphere rotator, in this case Venus. She presented a graph and calculations for 19 targets (tangential velocity vs. latitude) ranging from 90° N. to 90° S. at 10° intervals. The maximum tangential velocity was 1.8 m/sec at the Equator. There was a discussion of the large difference in solid body tangential velocity compared with Venus' winds.

[Venus\\_Tangential\\_Speeds\\_CStewartFeb122015.pdf](#)

Due to the absence of the remaining Sub-group proposers, those tasks will be postponed until the next meeting.

**Image Co-Registration:** Mark

Mark discussed the process of centering each of 9 images from Dec 14, 2010, using Photoshop and GIMP. Art has prepared a draft tutorial for Photoshop that will be placed on the new Venus Winds web page. With the tutorials and this demonstration, you should have enough information to start trying this yourself.

**Assignment: Co-Register Images** All researchers

Your assignment for the next 2 weeks is to center each of your 9 images from Dec 14, 2010 in a 512 x 512 image. Then bring these 9 processed images with you or email to Art before the meeting. The next meeting will be Thursday Feb 26 at 6:00 pm.

As an example of co-registration, Mark showed a group of 9 images from Dec. 14, 2010 that had been rotated and centered within a circle that represented the size of Venus on that day by Art. Four of his images required rotation of 2 deg CW and the remaining five 24 deg CCW. Unfortunately, some of the images did not have the centering circle on them! Art will correct those images for display next meeting.

Marta reported that the Venus Winds Project link on the Galaxy Guide Portal (<http://spaceodyssey.dmns.org>) has more links to useful data and information, such Agenda and Meeting Minutes, worksheets and tutorials, research papers, and web resources. If you have suggestions for additions to the website, please email Marta <marta.lindsay@dmns.org>, Mark or Art.

### **NEW BUSINESS**

The next meeting on February 26 will be at 6:00 pm in Exploration Health 202. Please note that this is a different room from where we met last time. It's on the second floor, over the cafeteria.

Submitted by Arthur C. Tarr, Venus Winds Project Coordinator