

Name: Deacon Pete Schumacher, VP-8 Engineer, U.S.A.

Questions:

1. **When** and **how** did you first hear about the Shroud?

I delivered a VP-8 Image Analyzer system to Captains John Jackson and Eric Jumper around 1976. I was the production engineer for this product. When I had finished training them on setting up, calibrating, and operating the unit, they asked me to employ the isometric plotting of brightness function to a Shroud of Turin image. What I saw was a 3D image of a person's face. This was my quite startling introduction to the Shroud of Turin. It is the only image able to cause this completely unique result.

2. What interested you about the Shroud?

Image processing, remote sensing, and spatial database analysis are sciences applied to the Shroud of Turin that are of the highest interest to me. It is not the process that causes unique results obtained in such analysis of the Shroud of Turin. It is unique features within the Shroud itself that causes such amazing results. Secondo Pia was the first to encounter a unique response to a common modern process (photography) in 1898. Jackson, Jumper, et al were perhaps the next to have such an experience (3D related to brightness plots of video images) in 1975 or so. My career has been with these sciences since 1972. I find the Shroud very intriguing.

3. Do you believe the Shroud is likely the burial cloth of Jesus Christ, a fake relic, or are you uncertain what to believe?

I firmly believe the Shroud of Turin is the true burial cloth of Jesus the Christ. I furthermore believe the image became part of the cloth at the time of the resurrection. While the Shroud has helped me grow in faith, it is not the sole element of my faith.

4. What, if any, actions did you take after you first encountered the Shroud (e.g., conduct research, contact people involved with it, etc.)?

I immediately contacted my family and, with the kind assistance of John Jackson and Eric Jumper, attempted to help them understand this amazing experience. Upon returning home, I began to study books about the Shroud. I sought information about the historical research and photographs of the Shroud.

5. Have you ever seen the Shroud at any of the exhibitions? If yes, which years?

I regret that I have not actually been in front of the Shroud and have never even been to Turin. On the other hand, my career is remote sensing and image processing and, while I have studied images from space and from the ocean floor, I haven't been in those places either. Presence in Turin would be a blessing. Perhaps one day I might have that opportunity.

6. What did you experience when you were in the presence of the Shroud?
Not applicable.

7. Have you ever been involved in any scientific study of the Shroud? If yes, please describe **what motivated** your work and **why**.

Yes. I am motivated by scientific curiosity to try to extract all of the information and detail from the Shroud that it has to offer. It challenges me to test, verify, and test again, and to learn all the truths I can from this most complex and intriguing cloth. I am also motivated by others who want to know about the Shroud and who push me to keep my knowledge of Shroud research up-to-date, especially as it pertains to image processing, remote sensing, and spatial database developments.

8. Have you ever written anything about the Shroud, either factual or fictitious?, please describe **what motivated** your work and **why**.

I have written only what I understand, to the best of my knowledge and experience, to be factual papers. I try to keep only within my own fields of expertise in what I write. I do my best to understand and rely upon qualified experts and juried peer-reviewed technical papers when I need to address other Shroud topics. Authentic scientific research and the complex technologies involved in conducting such research have always fascinated me.

The two most important and irrefutable modern day discoveries, by Pia for one and by Jackson et al for the other, both come from image processing and remote sensing of the Shroud. No picture of any other person, statue, or artwork produces results equal to Pia's photonegative of the Shroud. No photograph of any other person, statue, or artwork causes results equal to the brightness plot of the VP8 Image Analyzer system viewing a Shroud image. A third, recent improvement of image processing analysis has produced unequalled results from works by Dr. Petrus Soons, by Ray Downing, and by others who have proven the value of spatial database management and processing of Shroud images. These works yield outstanding 3D models of the data present on the Shroud. My continued work is motivated by these discoveries and process improvements. The Shroud is very exciting. It continues to prove there is always more to learn

about all the information it contains. Future technological tools may open doors to newer and deeper understanding of the Shroud and therefore, legitimate research must be continued.

9. Do you favor or believe any of the current theories on how the image got onto the cloth? If so please name the theory.

Dr. Jackson's theory on the "collapse of the cloth" is certainly very interesting. Image processing of the Shroud suggests to me that some form of radiation or dispersion from a single horizontal parallel plane at the median of the body likely plays a part in image formation. This might be explained by either Jackson's theory or perhaps other theories that do not disregard the facts of the Shroud's chemical, physical, and photogrammetric properties. A theory offered by Kevin Moran is worthy of some consideration, as it addresses various properties unique to the Shroud. Those theories, to me, are very complex. I am not a physicist and I have no way of performing a resurrection event in a lab. On the other hand, others who have suggested more simplistic theories as to image formation often tend to disregard both the composite nature of the Shroud (blood, image, and woven cloth) and the enormous body of knowledge gained from well-documented tests including various scientific and technical disciplines.

10. Do you feel that you have a calling or vocation to be involved somehow with the Shroud? If yes, please describe **what motivated** you to make a commitment to the Shroud and **why**.

The Shroud has led me on a journey, perhaps a quest, to learn more about the Shroud and especially "the Man of the Shroud". The Shroud is an obvious and irrefutable depiction of the torture and crucifixion of Christ as presented in biblical accounts. Thankfully, nobody alive today has witnessed a Roman crucifixion. How then, in this age, can we even begin to understand the full meaning and significance of such a horrific act as it pertains to Jesus?

As a Christian, and since June 2009 as a deacon in the Roman Catholic Church, it is my duty (as it is for all Christians) to share my faith and knowledge with others. I am motivated to share factual information concerning the Shroud. I have experienced the Shroud through image processing, remote sensing, and spatial database analysis in ways that have confronted me with new understandings unique to the Shroud of Turin. These results cannot be reproduced by any known methods. Though it is very complex and difficult for me to explain these "understandings" to others, it is no less necessary for me to try my best. My hope is that more people come to know this essential technical knowledge and gain a more complete understanding of the Shroud. If it is truly the burial cloth of Jesus with His image on it, as I believe, then it is a gift left by God for all of humanity. The Shroud then has a special purpose paid for at the most extreme price.

Please describe below any other *personal* reflections, experiences, insights, or thoughts about the Shroud of Turin that you would like to share.

Have you ever witnessed the joy of discovery when another person experiences the Shroud for the first time? I have had thousands of such occasions in the last two years. It has brought me much joy and a deeper appreciation for the Shroud of Turin. No other image in the world does what this image does!

It is "An occasion of grace in a secular place." My wife and I founded the Shroud Exhibit And Museum, Incorporated located in the White Sands Shopping Mall in Alamogordo, New Mexico. It is a non-profit 501-c-3 corporation listed in the Official Catholic Directory (2010). Everyone, including Susan and I, are unpaid volunteers. Since February 25, 2009, over 30 volunteers and tour guides have greeted over 5000 visitors. We have had more than 26,000 visitors to our web site, created and maintained by one of our gifted volunteers. Barrie Schwartz, Larry Schauf, and Dr. Petrus Soons have made special guest appearances and presentations here.

The experience of "meeting the Man of the Shroud" has touched many minds and hearts through this work of love. People who were simply shopping, teenagers wandering the mall, out-of-town visitors touring the White Sands National Monument or the International Space Museum, and teams of athletes competing in local tournaments, have simply "bumped into the Man of the Shroud".

Our purpose is "to make the Shroud an experience available to everyone, including persons with visual impairments and those who cannot travel to Turin." We highlight the facts of the 3D imaging discoveries with an operational, interactive VP-8 Image Analyzer system display used in research leading to the 1978 scientific expedition in Turin. A live VP8 camera is aimed at our main attraction, a full-size backlit image of the Shroud by Barrie Schwartz.

Writings/Websites/Blogs: www.ShroudNM.com