

The Appraisers for Georgi Nadjakov

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Abstract. The paper consist some archive data about the appraisers of the physicist Georgi Nadjakov by Robert Wichard Pohl and published data in connection with the Göttingen as result with his election and memberships as Corresponding Member at the Academy of Göttingen – 1940.

Keywords: Georgi Nadjakov, Appraisers

We do not have in Bulgaria until now precise correct and honest appraisers regarding the geniality of Georgi Nadjakov for our and general academic regret. His discovery recorded as “*photoelectretic condition of the substance*” need and forces us to edit with full new formula “*photo-electret spectral condition of the matter*”.

When we have step for clearance the profile of any scientist stay as request to be known who is that one and who do the apprise for the first one. – The level of his magnitude and qualification is for the science of the appraisal for the appraised and the real competence that is not destroyed with the time in the history. The majority of the eminent intellectual stays as valuable, when there consist his own achievements by the science for the scientist who is subject for appraising. If that initial conditions as criteria are not in the reality it be possible to has presumable defects and variants of wrongs of the appraising. With similar analyses it stays correct to be pointed over the political interference, if become as fact or some role with political symbols that go over the works of the Academy and also with the single scientists, that often as processing collapsed the science as common and last result. The political influence discredits the science. Now all about Nadjakov has collected with many different parameters.

With that case we have remarkable example – that is given by other remarkable physicist by the German scientists, who gives his exceptional high value for his Bulgarian physicist Georgi Nadjakov. That is Robert Wichard Pohl (1884 – 1976). The signature of R. W. Pohl stays on initial place over the main first basic document who certifies Nadjakov Corresponding Member of the Academy of Göttingen in 1939. Robert Pohl is the President of the Göttingen Academy at the year 1939. The offer and the election of Georgi Nadjakov as Corresponding member by his mandate become happen.

For outline with real details the big position of the Bulgarian physicist, experimenter Georgi Nadjakov we need to do evaluation to all others who pointed the high outstanding level of the Bulgarian one. By that statement we can a double real evaluation, and evaluation as that when become colored by several appraisers, and if then I use the light-physical terminology we can have the spectrum of the geniality, that lighted the discussed here giddy with his spectral personality the physicist Georgi Nadjakov.

Robert Pohl was born in Hamburg. He studied in the University of Berlin and graduated there in 1906. He worked in the Institute of physics at the University of Berlin (1906 – 1916) and in Göttingen University (1916 – 1952) where he was director of the Institute of Physics after 1921 [1].

By the position as director he become involved in the situation to know in precise reality all the experimental works and achievements of Georgi Nadjakov. Undoubtedly

between them exist active correspondence. Until now to us, it is not survived as we must sorry for that. It is important for new especial analysis the lecturing activity with his visiting in the University of Göttingen at the years 1938 and 1939 gives him possibility for many private meetings and contacts.

Robert W. Pohl authored long number of physical literature with many editions practically in all area of the science of the physics. All of that is dedicated to the mechanics, heat, optics, electricity, nuclear physics, and physics of the crystals. His book “*Electricity*” has 20 editions. His “*Optics and physics of the atom*” has 12 editions. “*Mechanics, acoustics, theory of the heat*” has 17 editions. That is the situation around the ending of the life of these two scientists (1980 – 1981). The books by Robert W. Pohl were translated on different languages but unfortunately it was not translated for the Bulgarian readers.

The Göttingen Academy established aspecial award – “*Robert Wichard Pohl*” and with that it was rewarded remarkable achievements in the area of physics. Robert W. Pohl is the very active person between of the theoreticians of the Hitler’s nuclear weapon and over him exist special interests. At the year 1951, he was invited in USA and here I offer his photography by the papers of the University of Illinois which show the interest over him by USA.

His book “*Mechanics, acoustic and heat*” was printed for a first time in 1911 [2]. Robert W. Pohl has detailed rich analysis over the Roentgen rays with elaborated monograph at the year 1912 [3]. He is the remarkable expert over the discovery by Roentgen. But the rays of Roentgen give only black-white image. Together, in co-authorship with Dr. Peter Pringsheim he published book “*Photo-electrical phenomena*” in 1914. That is an important survey book and collective result [4].

But personally the co-author Peter Pringsheim needs our knowledge as he is with very specific behavior as academic dignity. The review over him gives us some new, important, and exceptional facts. To him belongs German-French-American profile as physicist and by that his statement he observed and knows the young Georgi Nadjakov and all profile of the Hitler’s nuclear ideas and answers. Peter Pringsheim was born in Munich in 1881. He has doctorate in physics by the University of Munich at 1906. Between 1908 and 1933 he works in the Berlin’s University, between 1933 and 1940 in Brussels’s University and by 1941 did emigration in USA, and moved at California and Chicago universities. His exit, the abandoning from the model of Hitler’s yard documented him as disagree with the national-socialism in Germany. Now, here is enough for Peter Pringsheim. The emigration process of the scientist moves by his ideas, conceptions but also the results that he offers by himself and knowledge with disagreements.

The other book by Robert Wichard Pohl – “*Electricity*” (1927) is his own author monograph [5]. “*Optics*” is the other one by his monographs printed before the war (1940).

We must cleared the old statement as facts as in the past was unclear. At that time I did not have the connection to clear it for myself and to have the duty to announce and publish it.

At my study the insects and all over the science of entomology, I was remarkable teachers with matter of attention regarding a huge kingdom of the insects – the professors

Stoine Grigorov and Dobri Burov as they gives in his lectures that the importance mandatory needs to be clear. But at all profile and personality of Ivan Buresh these problems stay actual as for observing and study.

I had many conversations with Ivan Buresh through 1974 – 1978 years, when he was over 90 years old and expressed a perfect memory and arrange of the happens and the facts in the past. We discussed Röntgen phenomenon, as his father was photographer and came from Czech into Sofia to practice his profession here. In my conversation with Ivan Buresh, I asked him long number of questions – about Bachmetjew, for the entomology, the phytopathology, the Uranium phenomenon, for the circle of scientists around the King Ferdinand and all about the contribution of the intellectual academic elite in Bulgaria at the end of the 19 and the beginning of the 20 century. He share with me, that the first classical photographic picture produced in Bulgaria by the unknown (Röntgen) rays is made on his right hand when he was at age 5-6. The armature of the bones of wrist is precisely photographed and the bones were contrast. Those X rays photography has been produced around years 1891 – 1892. They prepared composed composition by mud which received by the sediments of the hot mineral water, that leak by the central Sofia mosque. Buresh keep about an hour his spread wrist of his right arm by glass over photography paper, as over the wrist stays leather envelope full with mud, collected as filtrate by the hot water spring under the Sofia mosque.

For our regret, this unique picture was lost in Sofia after one of the bombings by the American planes in 1942. But he clear for me that the work we named Röntgen rays was a question and challenge for the Czech photographer Josef Buresh and probably also the physicist Bachmetjew. Ivan Buresh's father was also interested of the bad action of the hot mineral water, which destroys the pictures.

I want to clear this – why, so often, the photo-process is being destroyed. That is because the developer's water for the process is not distilled. It is possible the natural radioactivity of the waters during the territory of Bulgaria in the photo-process to be overdone only after double distilling. That problem has the Czech photographers around Karlovi-vari, where stays the problem with the destruction of the developer and all developing with the photo-process. By that way probably really started the discovery by Wilhelm Conrad Roentgen, all that is my decision after my discussions with Ivan Buresh. And all evidently was known to Bachmetjew.

The process is different with Röntgen and the radioactive rays by the active mud but the photography way as application the result stay similar.

The importance news is coming here with the citation of the letter, which offered Nadjakov to be elected as a corresponding member of the Academy of Göttingen [6]. The basic signature here stays of Robert Wichard Pohl and evidently his opinion as estimation dominates: *“With that request we want to offer for acceptation the representative of the Sofia University, specialty physics, Professor Nadjakov, as corresponding member for our academy of sciences. With his experimental research, Professor Nadjakov stands in a complicate area, and namely electro-conductivity of isolated body. With a simple view as negligible skill, he contribute remarkable for improving the experimental techniques and by that way reduce the literature by wrong apprehensions. His work remind the similarity as Roentgen begins at those area, as namely by large examination of the static instrumentation for sensitive measurements. Mister Nadjakov takes at last time participation with the discussion for the nature of the latent*

photography over photographic plate. His thought indicate definitive clearness, as the problem of the latent picture, adjusted for chemical process stay different by a latent picture, which can be proved by the physical methods. Mister Nadjakov demonstrate exceptional friendly attitude regarding Germany and take care his best collaborators to had possibility for improvement in Germany" [7].

It is really appealing the deeply analytical characteristic, that in so short paragraph is doing the specialist knowing important study of Wilhelm Conrad Roentgen for the Bulgarian physic in very correctly similarity for the unique with the experimental methodic of Nadjakov. And the value of his argumentations regarding the both different ways for realization the photographic process the Göttingen researcher of Roentgen is very precisely determine the chemical developing of a photography, which is produced by chemical way and process with its demonstration in realization by differences under physical methodology.

That way as method of Nadjakov gives the global work with the color TV as with sending and receiving the image, with Internet, also with the both variants but with more and many applications. With different medical sensitive techniques and apparatus all those become in work after Nadjakov.

Many authors with marvelous unripe publications the priority of Nadjakov gives to him only to the double black-white picturing of the Nadjakov's method as by the past was understandable with the same way for the black-white television for the epoch before the color television that late conquered all world stay founded of the workability of the method of Nadjakov after his discovery. And that have to be known! That have to be known in all spectral-panoramic details and it belongs after his discovery.

That understanding for the photo-sensitivity in his colored differences we have to transfer to the bio-electric and to shift the processing with the bio-physiological mechanics. We do not know how the snail can see with this one with him is no eye, neither horn! With the fishes and the birds as with the human everywhere work the method of Nadjakov with his photoelectretes. With the insects looks with some unknown differences between some of them and the bio-statement of his discovery need to work. Here we must transfer the perspicacity of Georgi Nadjakov and to be grateful to him for the build in the theory of understanding the method of the catching the color spectrum and the reproducing the same spectrum. Georgi Nadjakov forces us to the understanding for not comfortable logistic and the visibility on all levels, as coordination in the space of the matter. His discovery can see also in the full dark.

The inquisitive is as Georgi Nadjakov understands perfectly the unique spectral directions of his discoveries and he describes them with self interview [8].

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