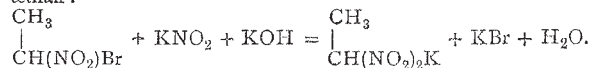


of practising medicine, took up chemistry as the aim of his life, and repaired to Stockholm as a pupil of Berzelius. Choosing the route from Lübeck by sea, he was obliged to wait six weeks for the departure of a boat. The tedious stay in that harbour was shortened through the acquaintance of a mineral dealer already known to Wöhler from the Frankfort fair, where he had exchanged hyaliths for other minerals, and where Wöhler had met Goethe bent upon a similar errand. He also made the acquaintance of a pharmaceutical chemist, Mr. Kind, at Lübeck, and with him prepared potassium in quantities hitherto unknown in Germany, and which, later on, Berzelius made use of in his studies of boron and silicium. Arriving after a stormy passage, he managed to find his way, by the aid of a Swedish student, with whom he had to talk Latin, the only language they had in common. He trembled almost at the first interview with the celebrated chemist, but was soon put at ease by his genial manner. Berzelius's laboratory was of the simplest. It consisted of two bare rooms and of a kitchen, which served at the same time for cooking the meals of the bachelor-household. This was the time when Berzelius had just adopted the chlorine theory. An old maiden cook who reigned supreme at the hearth complaining one day of the smell of "oxidised muriatic acid," Berzelius exclaimed, smiling, "There is no longer any oxymuriatic acid, Anna; you must say it smells very badly of chlorine." To try his pupil's patience, he put him to the analysis of lievriete, demanding great exactness. When the analysis did not come up to the mark, he said: "Doctor, that was quick, but bad." But soon he took the greatest interest in his pupil's researches on cyanic acid, for which the ferrocyanide of potassium had to be sent for from Lübeck. Berzelius kept his simplicity in his intercourse with the courtiers who sometimes visited the laboratory, and for whom some interesting experiments had to be performed. He was an excellent narrator, and Wöhler listened with the greatest interest to his recollections of Gay Lussac and of Sir Humphry Davy. Wöhler passed a very busy winter, spending his evenings in translating Berzelius' annual reports and Hisinger's treatise on mineralogy. When the spring came he enjoyed walks in the beautiful neighbourhood of Stockholm, studded with the last oaks of the northern zone, and he became intimately acquainted with the Swedish philosophers Caro, Mosander, Retzius, Arfvedson, Hisinger, and others who have now all left the scene of life. At last the time arrived when he had to take his departure from Sweden, and he did so, accompanied by Berzelius himself, who had invited him to take a journey through Sweden and Norway. Many mineral treasures were collected on the road, and the great mines and industrial establishments were visited. At Helsingborg the travellers stopped for several days to wait for the arrival of Brogniart, father and son, the French geologists, and of Sir Humphry Davy. The latter was then salmon-fishing in Norway, and announced his arrival to Berzelius in a letter commencing, "My dear sir and very honoured brother in science." He had some kind and encouraging words for young Wöhler, not forgotten by the latter in his celebrity and his old age. Sir Humphry soon left for Copenhagen, where he had an engagement to shoot snipe with Forchhammer. Oerstedt arrived also to pay Berzelius his respects, and so did several professors from the neighbouring university of Lund. In fact, Berzelius's celebrity was so great that an official in the passport office refused to take any fee from the pupil who had come to study under such a master. Messrs. Brogniart had taken their comfortable travelling carriage over from Paris. Their comfort, however, was disturbed by the arrival of a French courier, the bearer, as they feared, of news of Louis XVIII.'s death. Putting the question to the courier, they received the answer, "Messieurs, vous savez, qu'un courier doit être aveugle, sourd et muet." The journey to Norway was continued in common, the elder Brogniart and Berzelius occupying the carriage of the former, Wöhler and the younger Brogniart following in Berzelius's carriage. They often had to stop all night in their carriages; for it so happened that the Crown Prince preceded them on their road with a numerous suite, and the inns were overcrowded. We cannot enter into the details of this interesting journey. When it came to a close at Helsingborg, Wöhler had to take leave of his master, and the feelings of regret were mutual and deep. Translating Berzelius's reports and his handbooks became henceforth a duty to Wöhler, by which, regardless of the time it demanded, he tried to repay a debt of gratitude. The meeting sent a vote of thanks to the great and modest author of these recollections, praying for his permission to print them in the Society's Reports; and your correspondent hopes he may be forgiven any indiscretion he has been

guilty of in preserving for the scientific world these short extracts. —Th. Zoeller and E. A. Grothe have introduced xanthogenate of sodium as a remedy for Phylloxera. Compared with the sulfocarbonate of sodium, it deserves the preference. CS SNa is easily transferred into CS_2 and HS_2 , the former killing the Phylloxera, while the latter gas injures the vine; but xanthogenate of sodium, $\text{CS} \frac{\text{SC}_2\text{H}_5}{\text{ONa}}$, cannot produce hydrosulphuric acid, and appears to be by far the better remedy of the two, as well as the cheaper one.—S. Reymann proposes the following way of determining the amount of orcin contained in lichens. Bromine-water of known strength is added to the solution, producing tribromocine, $\text{C}_7\text{H}_5\text{Br}_3\text{O}_2$, until the solution has a permanent smell of bromine. Iodide of potassium is then added, and the amount of iodine set free (corresponding to the excess of bromine added) is determined by volumetric analysis.—The same chemist described an easy method of determining the quantity of bromoform contained in commercial bromine.—E. Donath described a method of extracting from yeast a substance inverting cane-sugar, and called by him invertine.—E. Zuercher has found bromonitroæthan to be transformed by nitrite of potassium and alcoholic potash into yellow needles of potassic dinitroæthan:



The substance resembles the corresponding picrate. The acid is an oily liquid.—E. Forst and Th. Zincke have oxidised the two isomeric glycols, hydrobenzoine and isohydrobenzoine, $\text{C}_4\text{H}_8(\text{OH})_2$. Both yield benzoic aldehyde. The authors try to explain the identity of these reactions by constitutional formulae.—F. Tieftrunk exhibited specimens of gas-tight membranes, invented by Mr. Schülke, and used for a new system of dry-meters by Mr. S. Elster in Berlin. The membranes are not acted upon by hydrocarbons, sulphuret of carbon, or ammonia, and form a much better material for dry-meters than leather. Mr. Tieftrunk demonstrated another application of this invention, consisting in a gas-burner yielding a constant flame. An air-bath heated with this burner did not vary in temperature more than one degree during six hours.

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