## Johann Alexander Herschel (Alexander)

**Early Life**: Johann Alexander Herschel (*Alexander*) was born in Hanover on the 13<sup>th</sup> November 1745 to Isaac and Anna Herschel. A tumultuous period in European history, his father Isaac was bandmaster in the Hanoverian Guards. Owing to military commitments his father was often absent and subsequently Alexander hadn't benefitted as much from his musical tuition as his father would have desired.

This was an unsettling period for the family, and Alexander's younger sister Carolina Lucretia (*Caroline*) recalls in her diaries and memoirs that she was sent regularly to accompany Alexander to the garrison school. Thus, Caroline and Alexander formed a close bond that remain throughout their lives.

Isaac agreed to Alexander leaving school at the age of 12 to become a musical apprentice to Heinrich Griesbach the husband of Isaac's eldest daughter Sophia (living in Coppenbrügge, a town about 43km to the south of Hanover). Periodic visits by Alexander's mother Anna revealed in Caroline's memoirs shown Anna's concern at Alexander's treatment by his master Griesbach.... "who gave him {Alexander} in her presence with a cause a box on the ear, when the poor boy was sorely afflicted with the mumps!"

Heinrich Griesbach had been in the same military band as Alexander's father. Both the Griesbach and Herschel families were busy and musically ambitious, and much could be gained from both personal and professional connections. Indeed, Alexander's sister Sophia had five sons (thus Alexander's nephews) who were destined to all play in the English royal court in Queen Charlotte's band, one by one coming to settle in England as the opportunities for them arose.

Alexander himself returned from Coppenbrügge to Hanover in 1764 (aged 18) at the end of his apprenticeship but with cramped conditions in the Herschel household he was sent to board with other city musicians. An agreement had been reached for him to take the position of 'Stadt-Musicus' or 'Town Musician' with the city's musician Ziegemeyer whom he joined in the Easter of 1764.

It was noted Alexander had the potential to become a very good violin player and the advantage of his appointment meant he had considerable leisure time. However, Alexander, whilst pursuing his musical vocation, was clearly not as frugal or disciplined as his younger sister Caroline, who recalls her concerns about him in 1768..... "I was extremely discomposed at seeing Alexander associating with young men who led him into all manner of expensive pleasures which involved him in debts for the hire of horses and carioles, &c.,"

None the less, his spare time did allow him to help support the family and it is also around this time that we get our first insight into Alexander's other growing skills as a craftsman,... "as he often amused himself with making all sorts of things in pasteboard, or contriving how to make a twelve-hour Cuckoo clock go for a week..."

With his father Isaac in ever increasing poor health, Alexander continued to fulfil various musical appointments (1765/1766 takes a position as oboist in the regimental band of Prince Charles – brother to Queen Charlotte). It is also at this time that his elder brother Friedrich Wilhelm Herschel (**William**) arrived in the provincial spa City of Bath to set-up there as a musician, something which in time would have a profound impact on both Alexander and Caroline.

The Move to Bath: William had proposed that his younger sister Caroline should join him in Bath, a scheme which their elder brother Heinrich Anton Jacob Herschel (Jacob) had resisted, but before this could be resolved Jacob himself made the journey to Bath (in 1770) taking Alexander with him. Alexander had been given two years leave of absence from his musical appointment; with his younger brother Johann Dietrich Herschel (Dietrich) deemed competent to take his position as well as to attending to Alexander's private pupils whom he had been tutoring.

Alexander thus arrived in Bath, the intention being to remain two years which turned into forty-six! Initially, taking up lodgings with his brother William, he soon obtained a position with the band at the Orchard Street Theatre. Alexander already an accomplished violinist and oboist, in Bath he became known for performances on the clarinet and cello.

Jacob soon returned to Hanover and a further two years passed before William and Alexander were joined in Bath by their sister Caroline in 1772, thus the family trio of musical (and as-yet to be established) astronomical talent is formed!

William was already becoming increasing preoccupied with a growing passion for the philosophical sciences and in particular astronomy fuelled his desire to

observe the night skies. Outside of Alexander's musical commitments he found himself, along with his sister Caroline, pressed into helping William with the construction of telescopes and their mountings and all manner of other items.

Notwithstanding various changes in accommodation necessitating Alexander taking up separate lodgings, he was often found with William and Caroline. Although a gifted musician Alexander had less success with romance! In 1773 he became engaged to a friend of Miss Bulman (the family with which William had co-habited on his arrival in Bath) however Alexander's fiancé, Miss Cohlman, was seen with a former suspected lover and the engagement was ended with the assistance of William who 'persuaded the Lady to return the ring by which they were betrothed'.

Alexander was also noted as being subject to periods of melancholy, with Caroline describing periods when he was 'in the dismals'. None the less, his love and devotion to his brother and sister is unquestionable as is their mutual support for one another whether professionally or personally.

By 1774 William's telescope making (especially out of the musical season) led to the house William and Caroline occupied being transformed to look more like a workshop. Caroline describes Alexander "putting up a huge turning machine in a bedroom for turning patterns, grinding glasses & turning eyepieces". It was Alexander who was often deployed to use these machines and when not using the turning machine he was making other instruments and clocks.

Considering their professional reputations, it is perhaps surprising that both Alexander and William risked their ability to play musical instruments by using the various machines not to mention casting and shaping metal mirrors. In one instance, Alexander and William had rushed at night to use a grindstone to sharpen various tools, only for William to be fetched home by his brother minus a fingernail.

Alexander's romantic encounters took another blow when Miss Whiler who was described as a 'very handsome girl' took an interest in him, for it only to be discovered she had more than one lover, so once again Alexander was jilted.

But his busy musical commitments and assistance to his brother provided the necessary distractions, being especially expert in brass work, Alexander is believed to have undertaken the turning of the eyepieces and screws on the lathe of the various 'Herschel' telescopes constructed in Bath.

**A 'New Planet'** Alexander's engineering skills became even more in demand following William's discovery of the planet Uranus from the garden on 19 New King Street, Bath in March 1781. The discovery of Herschel's Planet' had a profound impact not only on the scientific community but on the Herschel partnership of William, Caroline and Alexander.

Within a year William had obtained Royal patronage from King George III and moved with Caroline to Datchet (and later to Slough). Alexander remained in Bath (at 19 New King Street) continuing to follow his musical career. Matthew Spring of the Herschel Society advises that Alexander "performed in most of the bigger ensembles, subscription concerts, garden concerts, gala and oratorio events, in addition to the theatre. He was important as an early string quartet player (with Loder, Brooks and Rogers) at a time when string quartet playing was relatively new and certainly new to Bath".

As time permitted during his annual summer, he would visit his brother and sister, quite willingly continuing to assist William with his continued passion for building ever larger telescopes. He also created a simple journeyman clock for Caroline which was called the Monkey clock and was used by Caroline when sweeping for comets to allow accurate recording of times.

The discovery of Uranus combined with William's growing reputation and position as King's Astronomer, led to a growing side-line in telescope making and once again these commissions were frequently aided by Alexander.

William writing to Caroline in 1801 reveals... "I hope they will not want Alexander at Bath this good while, as I shall have much occasion for his help in fitting up these seven-feet telescopes".

Similarly, the great 40' telescope did not escape the hand of Alexander especially when the giant mirror needed to be removed for polishing. Caroline once wrote to William's son John that "Your father and uncle Alexander too have had many hair-breadth escapes from being crushed by the taking in and out of the mirror".

Marriage Alexander in between his musical engagements and the demands of his brother none the less caught the eye of a widow, Mrs Margaret Smith of Walcott Street, Bath whom he married in 1783. Caroline didn't get on with her, but William seemed more accommodating. Unfortunately, Margaret became ill and died in 1788 and is buried at Weston Church, Bath. The couple had no children.

Despite the loss of Margaret, Alexander remained in Bath a further 28 years finally returning to his hometown of Hanover in the August of 1816 following a *'severe accident'* (the nature of which is not known) taking with him his own gregorian telescope and two 9inch mirrors. He died just five years later, on **16th March 1821**. Caroline returned to Hanover in 1822 after William had died just a year after Alexander on the 25<sup>th</sup>August 1822.

**Summary** Was Alexander the forgotten partner? We owe much of what we know about him to the letters and memoirs of his sister Caroline. A glimpse of his musical talent and the respect his fellow musicians had for him is reflected in the comments of the *Bath Chronicle* which in 1816 on his departure from Bath recorded.... "the intention of the musical professors of Bath to pay a gratuitous tribute to the talents, character, age and virtues of Mr Herschell of this city, who has been their co-adjudicator in the orchestra on the Violincello for the last 45 years..."

There are no portraits of Alexander, no scientific discoveries attributed to him, no musical compositions bearing his name, no blue plaque and yet he was undoubtedly William's valued assistant, craftsman, and skilled precision engineer and clock maker. Next time we talk about William's famous 7-foot telescope (or indeed any of the Herschel telescopes) we should spare a thought for Alexander. Bath's musicians clearly had a great respect and love for Alexander as did William and Caroline. Perhaps, he is not forgotten after all.

Jonathan Hall Herschel Society 6<sup>th</sup> March 2021

(With thanks to Matthew Spring for additional comments on the musical aspects and Simon Holbeche from whose original piece on social media this biography was inspired).

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