

SPRING REPLACEMENT

Industry best practice

All spring clips tend to age and degrade in normal service operation. This is mainly due to a combination of heat and vibration, (although other factors can also affect spring performance), and will cause the springs to relax and reduce their ability to deliver constant force throughout the wearing length of the carbon brush.

The spring clips should therefore be replaced periodically, the interval being defined by how arduous the application is. Very often and in the absence of supportive field data, it is generally considered best practice to replace spring sets every 18 - 24 months. The period, normally fitting around other aspects of the planned service or maintenance schedule.

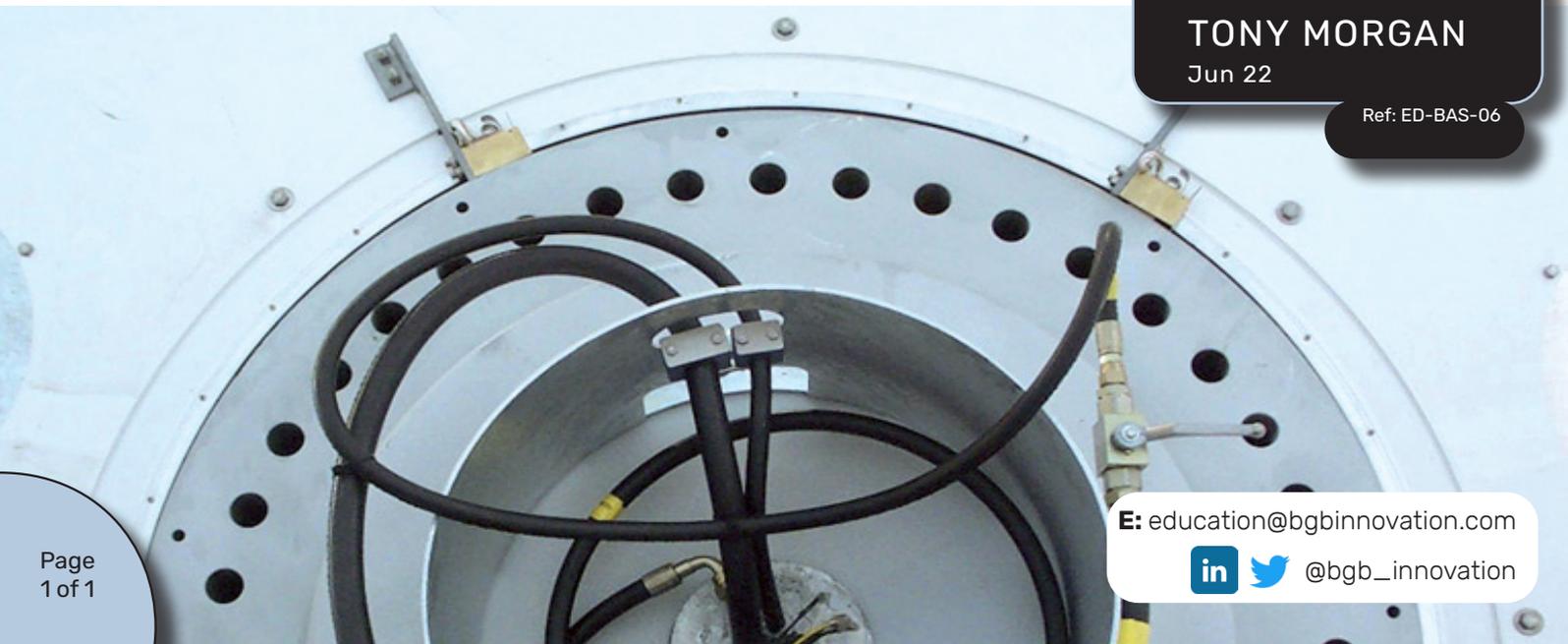
When replacing spring clips, it should ideally be done as a complete set to avoid potential issues with adverse current share/ selectivity as a result.

If there is any noticeable damage to the springs such as arcing or distortion of the spring coils ('barrelling' or 'kinking') before this time period, then it is required that they should be removed and replaced. All coils should move freely with checks made to distinguish any stiction within the coils, for example, inserting an implement such as a pencil into the coil with the clip removed and slowly moving it up and down within the normal movement range to check for smoothness of motion.

BGB provide replacement clips that are indelibly marked with the spring force in either Newtons or grams and which can be date coded with month and year of manufacture (MM/YY) for ease of tracking or rotation on a given application.



Pictured: Spring Clips in the wind industry.
Below: Lightning brush holder that uses constant force springs



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