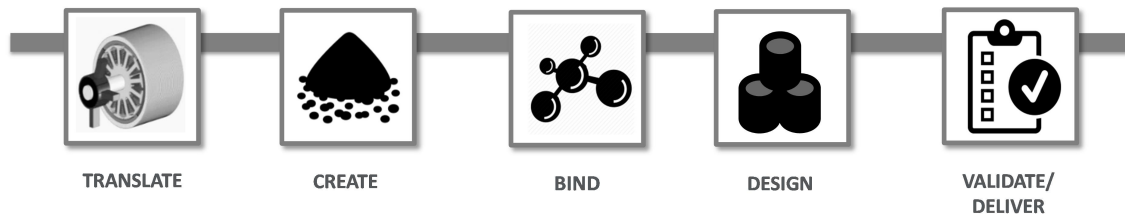


Magnetic Solution for Automotive Industry

Bonded neo magnets have been employed across various industries that require higher performance magnets to enable smaller size and greater efficiency motors. Bonded magnets are also a key solution provided to the automotive industry, where increased need for comfort and functionality paired with efficient and complex control systems within a passenger vehicle has led to the proliferation of bonded neo magnets.

Application design engineers across the automotive industry have started to develop cost optimized magnetic solutions using bonded neo MQ1™ magnets. Introducing MQ1™ magnets to seat motors, tail gate/power lift gate motors, automotive pumps, and sensors have made bonded neo magnets as an industry standard for automotive applications.

Magnequench as a pioneer and an industry leader within bonded magnet industry, works closely with magnet users or motor manufacturers. At Magnequench, motor design engineers and material scientists help customers by designing novel magnetic solution and ensure optimized motor performance for any application using various tools available in-house.



Translate motor performance into magnet design concept at best-cost performance

With the use of analytical tools like “SPEED” and “Vector Fields-FEA”, we can determine the requisite magnetic field, optimal magnet dimension, and magnetization profile to translate motor performance into magnet design concept at best cost-performance.



Create/Identify cost-optimized magnetic powder

With over 30 years of bonded neo powder manufacturing experience, we have the ability to rapidly develop optimized MQP™ powder grades. By continuously analyzing and implementing methods to achieve maximum performance from jet-cast MQP™, we are able develop bespoke alloys to meet your specific cost-performance needs. By leveraging our jet caster and material knowledge, we have developed MQP grades which are ideal for different application needs.



Determine/Develop ideal epoxy binder system

Our compounds development team are also able to determine and customize the ideal epoxy resin system to meet targeted application requirements.

Our technologies and our ability to develop bespoke binders enable:

- Thinner/Taller ring magnets
- Higher B_r (due to higher magnet density)
- Tighter magnet tolerances
- Improved mechanical strength at faster motor rotation speeds



Provide high-performing bonded neo magnets

With a fully equipped pilot scale magnet making facility and a group of experienced magnet engineering team, we are capable to provide you sample magnets rapidly for your applications development. We provide custom manufacturing your magnets in unique and precise specifications, to harness the benefits bonded neo for optimum cost-performance. As our magnet engineering team also has inherent knowledge of the latest MQP™ developments, you are ensured access to new bespoke powders to generate innovative and advanced magnet solutions. Our experience with FEA and motor design allows us to design and build magnetizing fixtures to achieve the optimum magnetization profile for an application too. Once your application is ready for commercialization, we can also supply you magnets with production scale.



Test and validate performance as required

Our motor technology team can replicate many of the tests on the motors ourselves. We serve as an outside laboratory on motor performance and characteristics to ensure all design solutions are validated.

By capitalizing on our extensive knowledge of the magnet industry, we can assist you and save valuable time and resources by identifying the ideal magnet to best suit your needs.

Please contact us today for samples or a quotation.

About Us:

Magnequench is the industry leader in bonded neo magnetic powders, magnets and their application.

Please visit our website:

www.magnequench.com

If you have technical questions on the products please contact us:

research@magnequench.com