RATIONALE FOR A NEW CANCER TREATMENT

To say that most cancers remain incurable is a profound statement, but by examining current options we are dismayed by existing shortcomings of the different therapeutic modalities.

Cancer drug development has been a "cat-and-mouse" pursuit, with cancers always finding a means to evade and acquire drug resistance, subsequently leading to disease recurrence. The mechanism of recurrence is spurred by the compounds themselves with the unwitting event of selecting impervious mutations. When coupled to the genetic complexity of each cancer, outcomes can be extremely variable between patients for a single drug.

Surgical and radiological approaches aim to remove or severely damage the tumor, respectively. However, surgeries are not without their complications and side-effects. For example, even with the high survival rates associated with thyroidectomies, patients are prescribed levothyroxine (Synthroid®) for their lifetime. Other times, surgeries may result in prolonged recovery times or other side-effects that can have a serious impact on lifestyle.

Radiotherapy is limited by guidelines and the amount of radiation that can be given per session and over the treatment period. These guidelines differ between cancer types, and like drugs treatment regimes, selection pressures can also persist and result in the development of radioresistant tumors.

Therefore, when evaluating the quality of life following these options, we need something revolutionary approach to how we treat cancer.

GNR introduces the BioNanofluid to targeted treatment of Papillary Thyroid Cancer, HER2+ Breast Cancer, and Prostate Cancer.

