

An Assessment of Genetic Counselors' Knowledge and Attitudes Toward Counseling for Gene Therapy

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Genetic counselors play essential roles in informing patients of the most up-to-date options for care and management. Given the recent advances in gene therapy, there is a growing need for genetic counselors to be knowledgeable on the topic in order to educate patients on the benefits, risks and limitations of the technology. This study aimed to assess genetic counselors' current exposure to discussing gene therapy, attitudes toward gene therapy applications, and self-reported knowledge on the topic. Results showed that 47.83% (88/184) of the respondents discussed gene therapy with a past patient, most of whom had the conversation with one to ten patients in total. Most respondents reported having limited knowledge in the field. These results suggest the need for continuing education, as most genetic counselors believed that counseling for gene therapy will eventually become part of their roles given the technological advances and the evolving nature of the profession. In assessing genetic counselors' personal attitudes towards gene therapy, data showed that respondents were more likely to pursue gene therapy if they or their children were hypothetically diagnosed with a more severe genetic condition. As the severity of the condition decreased, respondents' comfort levels with gene therapy also decreased. Interestingly, responses between the use of somatic versus germline gene therapy did not largely differ. Given the ethical implications of germline treatments, future studies on the factors influencing genetic counselors' acceptability of both somatic and germline gene therapies are warranted.