

PICOT Assignment

Question: Are male children between ages three and twelve compared to female children of the same age and previous medical history at a higher risk of developing pediatric autoimmune neuropsychiatric disorder associated with streptococcal infection, before reaching the age of sixteen?

Summary: Many children experience streptococcal infections between ages three and sixteen. Pediatric autoimmune neuropsychiatric disorder associated with streptococcal infection is also called PANDAS. PANDAS is also a subgroup of PANS which stands for pediatric acute-onset neuropsychiatric syndrome. According to the Journal of Neuropsychiatry and Clinical Neurosciences, “Pediatric autoimmune neuropsychiatric disorders associated with streptococcal infections (PANDAS) is characterized by the sudden onset of obsessive-compulsive disorder (OCD) and other neurobehavioral symptoms following group A streptococcal infection.” PANDAS has an abrupt onset of developmental and motor symptoms and is a juvenile condition. According to research, “The etiological events causing the disorder are not always detectable; therefore, no guideline for treating patients is homogeneously recognized” (Sung Yoon Cho, 2018). Children who are anywhere between three and sixteen experience many different changes throughout their lives. Many children face not only physical changes, but also psychological changes. Male children seem to have a higher chance of developing pediatric autoimmune neuropsychiatric disorder associated with streptococcal infection. According to Spandidos Publications, “There are several risk factors for the onset of PANDAS syndrome, such as repeated group A streptococcal infections and family history of autoimmune disease or rheumatic fever. It more frequently affects males and children with ages between 3 and 12” (Dop, D., Marcu, I., 2020). Many researchers believe that PANDAS is more prevalent in males than females. Pediatric autoimmune neuropsychiatric disorder associated with streptococcal infections are rare but can have lasting effects if left untreated. PANDAS and PANS can greatly affect a child and their future by changing not only behavioral characteristics, but also motor characteristics.

Conclusion: Pediatric autoimmune neuropsychiatric disorder associated with streptococcal infections trigger an arrival of symptoms about four to six weeks after a child has a streptococcal infection. PANDAS can have lasting effects on children if they go untreated. Researcher’s state, “Although children fully recover, there are patients who develop persistent neuropsychiatric symptoms or present worsened symptoms after each streptococcal infection” (Dop, D., Marcu, I., 2020). Pediatric autoimmune neuropsychiatric disorder associated with streptococcal infection is extremely rare; however, based on research it seems to be more common on males from ages three to twelve. Research shows, “The psychological symptoms may include repetitive, obsessive-compulsive behaviors, separation anxiety, fear, and panic attacks, incessant screaming, irritability, frequent mood changes, emotional and developmental regression, visual or auditory hallucinations, depression, and suicidal thoughts” (Dop, D., Marcu, I., 2020). PANDAS can become more prevalent in a child based on their own history and their family’s history. Being a male child also seems to increase the risk of developing pediatric autoimmune neuropsychiatric disorder associated with streptococcal infections. Throughout my research I was able to see that

PANDAS can greatly affect a formerly healthy child and their family. PANDAS may be rare, but it needs to be diagnosed and treated early to have the smallest long-lasting effects.

Work Cited

Primary Source:

Pediatric autoimmune neuropsychiatric ... - pandas network. (n.d.). Retrieved March 14, 2022, from <https://pandasnetwork.org/wp-content/uploads/2019/02/2018-PANDAS-Clinical-Manifestations-IVIG-Treatment-Outcomes-Results-from-a-Cohort-of-Italian-Patients-.pdf>

Secondary Source:

Colvin, M. K., Search for more papers by this author, Erwin, S., Alluri, P. R., Laffer, A., Pasquariello, K., & Williams, K. A. (2020, December 2). *Cognitive, graphomotor, and psychosocial challenges in pediatric autoimmune neuropsychiatric disorders associated with streptococcal infections (pandas)*. *The Journal of Neuropsychiatry and Clinical Neurosciences*. Retrieved March 14, 2022, from <https://neuro.psychiatryonline.org/doi/abs/10.1176/appi.neuropsych.20030065>

Tertiary Source:

Dop, D., Marcu, I. R., Padureanu, R., Niculescu, C. E., & Padureanu, V. (2021, January 1). *Pediatric autoimmune neuropsychiatric disorders associated with streptococcal infections (review)*. *Experimental and Therapeutic Medicine*. Retrieved March 14, 2022, from <https://www.spandidos-publications.com/10.3892/etm.2020.9526>