Auricular Perichondritis in a Tertiary Rural Hospital

ABSTRACT

Objective: Auricular perichondritis refers to inflammation involving the perichondrium of the external ear. It is a very serious disease which may lead to permanent deformity of the pinna. We describe the predisposing factors, pathogenic organisms, interventions and residual deformities in a prospective consecutive sample of patients.

Methods:

Design: Prospective Cohort Study

Setting: Tertiary Rural Government Teaching Hospital

Participants: All patients presenting with auricular perichondritis for a period of one year between March 2011 and February 2012 were consecutively enrolled and a clinical history and demographic details were obtained. Routine hematologic, blood biochemical examinations and culture/sensitivity of discharge from the pinna were conducted, and empiric intravenous ciprofloxacin was administered and continued if confirmed by culture and sensitivity. Those sensitive to co-amoxiclav, ceftazidime or amikacin were shifted to those medications. Medications were shifted to oral forms when available and indicated by resolution of acute inflammation, wound healing and no growth on cultures. Parenteral medications were maintained until the same parameters were achieved. Surgical incision and drainage was also performed when indicated, followed by a standardized wound care regimen. Follow up was for six months ending with assessment of pinna deformity.

Results: Of the total study population of 50, 76% were male and 24% were female; 15-75 years of age (range 60 years) displaying male predominance and clustering in the fourth decade of life. The most common predisposing factors were trauma from motor vehicle accidents (30%) followed by high ear piercing (22%). Pseudomonas aeruginosa (48%) followed by Staphylococcus aureus (20%) were the most common organisms isolated. All were managed with intravenous antibiotics but 76% also required surgical intervention. Sixty-eight percent developed residual deformities of the pinna with 50% being total and 18% being partial.

Conclusion: Auricular perichondritis is a frightening disease which requires early management. As Pseudomonas aeruginosa is the most common organism, antipseudomonal antibiotics should be started as early as possible. Despite medical and surgical intervention, residual deformities may ensue.

Keywords: auricular perichondritis, pinna, trauma, Pseudomonas aeruginosa