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Case Report-A learning from clinical experiential history

세포교정영양요법(OCNT)을 이용한 장상피화생 환자 사례 연구

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A Case Study on the Use of Ortho-Cellular Nutrition Therapy (OCNT) in Patients with Intestinal Metaplasia

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ABSTRACT

Objective: A case report on intestinal metaplasia improvement using Ortho-Cellular Nutrition Therapy (OCNT)

Methods: A 68-year-old Korean female shows symptoms of atrophic gastritis, indigestion, abdominal distention, and gallbladder pain, causing inconvenience in her daily life.

Results: Symptoms of intestinal metaplasia improved after nutritional therapy

Conclusion: Nutrition therapy can help improve symptoms and alleviate dyspepsia in patients with symptoms of intestinal metaplasia.

Keywords Ortho-Cellular Nutrition Therapy (OCNT), intestinal metaplasia

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Introduction

Intestinal metaplasia refers to the changing surface of the stomach wall (mucous membrane) like the surface of the small intestine wall. It is yet unclear why the gastric mucosa changes to the intestinal mucosa. Atrophic gastritis (thinning of the gastric mucosa), which is type of a chronic gastritis, usually become intestinal metaplasia, which indicates that long-term exposure of the gastric wall to inflammation is considered one of the major

causes.[1]

In other words, it can be estimated that the phenomenon in which the gastric mucosa changes like the intestinal mucosa is accelerated when inflammatory factors become involved in the process of gastric mucosal cell replacement due to inflammation or wounds and new formation. There is no treatment method available for intestinal metaplasia from a modern medical point of view as of now.

As intestinal metaplasia cells can develop into gastric cancer through dysplasia, they are considered pre-cancerous cells.[2]

Diagnosis of intestinal metaplasia can be made only based on the observational findings through clear primary endoscopic observation, and diagnosis is made by microscopic observation through biopsy when observational findings are ambiguous.

If intestinal metaplasia is diagnosed based on the endoscopic observation, the hospital will recommend undergoing endoscopic observation on a regular basis, and in the case of moderate intestinal metaplasia, endoscopic observation is recommended once a year.

For early stage intestinal metaplasia, endoscopic observation is recommended once every two years, and the only method available in modern medicine is to carry out observation regularly to perform a surgical procedure at an early stage if gastric cancer progresses.

Therefore, from the patient's perspective, his/her anxiety grows not knowing when it will turn into cancer since it feels as if they are waiting for a death sentence when intestinal metaplasia is diagnosed. Many studies have proven that patients with intestinal metaplasia have 11 times higher chance of developing gastric cancer than the general population.[1] The cancer incidence in Korea shows that gastric cancer is ranked first in the 2018 statistics, followed by the incidence of gastric cancer accounting for the top ranking of 3rd or 4th place. It is apparent that intestinal metaplasia requires particular attention in Koreans, as there is a low prevalence of gastric cancer (2%) among people of European descent. When intestinal metaplasia develops in the normal digestive system, the patient's digestive system will be dysfunctional, which may result in psychological depression due to the possibility of developing cancer. The stomach is susceptible to several diseases, including acute gastritis, chronic gastritis, erosive gastritis, ulcers, atrophic gastritis, intestinal metaplasia, and gastric cancer. According to Seoul National University Bundang Hospital's survey of 389 people between 2003 and 2007, "intestinal metaplasia" was found in 11% of patients in their 30s, 30-31% in their 40s and 50s, 34% in their 60s, and 50% in their 40s and older.[3]

Among many, the major focus of this study is intestinal metaplasia.

Cases

1. Target

The target includes a single case with a patient diagnosed with intestinal metaplasia.

1) Name: Kang, O O (F/68 years old)

2) Diagnosis: Atrophic gastritis, intestinal metaplasia

3) Date of Onset: November 21, 2019

4) Treatment Period: November 21, 2019 to June 26, 2020 (Approximately 7 months)

5) Chief Complaint: Intestinal metaplasia, atrophic gastritis, dyspepsia, abdominal distension, gallbladder pain

6) Past History: Bronchiectasia

7) Social History: No history of smoking and alcohol
8) Family History: Stomach cancer
9) Current Medical History and Drug Administration: ppi antacid, digestive, prokinetics

2. Method

For OCNT, Cyaplex-A 101, Euphaplex Stick 101, and Heartberry Black 101 were recommended and administered orally twice a day, as well as herbal granules that help with the patient's digestion.
In addition, patients were recommended to improve their diet management, lifestyle, and exercise habits. The relevant improvement proposal is as follows.

Diet Improvement

Patients were recommended to eat three meals a day that consist of regular Korean food in an appropriate amount and follow the eight things listed below.
1. Mixed grain rice or white rice for the time being when experiencing digestive system dysfunction. The menu shall consists of seasoned vegetables (Namul), vegetables, seaweed, fish, and fermented soybeans (Chunggukjang, soy sauce, and soybean paste).
2. Main vegetables to be consumed should include beans, carrots, zucchini, garlic, onions, and wild edible greens, and main seaweed-type food to be consumed include seaweed, kelp, and dried seaweed.
3. Sea salt can only be used as seasoning (mineral bamboo salt is recommended)
4. All monosaccharide, processed and concentrated sugar products (oligosaccharide, sucrose, and fructose) must be eliminated completely and complex carbohydrates (grains, vegetables, fruits, seasoned vegetables, and seaweed) and dietary fiber should mainly be consumed.
5. Milk, dairy products, eggs, cooking oil, coffee, snacks, ice cream, fried food, grilled meat, nuts, and peanuts must be completely excluded.
6. Bottled water is recommended instead of tap or purified water.
7. Synthetic ingredients such as shampoo, conditioner, perfume, cosmetics, air freshener, and deodorant should not be used.
8. GMOs (wheat, corn, soybeans) must be completely excluded from consumption.

Lifestyle

1. Always keep a positive and optimistic mindset.
2. Enjoy exercising on a regular basis.
3. Create the optimal bedroom environment for deep sleep.

Exercise Habits

Stress, tension, depression, lethargy, and anxiety can cause or aggravate pain, inflammation, or tumors, so reducing stress through breathing, posture, bodywork, and exercise can increase one's immunity levels.
1. Breathing
Diaphragmatic breathing, in other words, abdominal breathing, improves energy levels, reduces tension, and improves mental activities.
2. Posture
Poor posture, such as slouching, drooping shoulders, or a lowered head, can lead to shallow breathing and low energy levels, but lifting the head to sit up and straightening the spine and neck can bring about full level of self-confidence and increase energy levels.
3. Bodywork
Bodywork relieves tension by continuously

stimulating the connective tissue that supports the human body, muscles, bones, and organs softly, and regular exercise can make one feel better and relieve stress and tension by releasing endorphins.
4. Exercise
30 minutes of daily exercise (10 minutes of bodily exercise, 20 minutes of walking) can reduce stress, tension, depression, lethargy, and anxiety.

Result

Gallbladder pain (discomfort under the right rib) was relieved by about 50% after 1 month of nutritional therapy, and feeling of discomfort in the digestive system was completely disappeared after 2 months of treatment.
However, endoscopy was to be conducted after 6 months of administration because the 6-month duration was emphasized for complete OCNT. However, endoscopy was performed after 7 months of administration as the endoscopy procedure vacancy was unavailable and delayed.
Results of endoscopy revealed that atrophic gastritis and intestinal metaplasia were completely cured, but the bile duct function was significantly reduced due to abnormal bile secretion with its current level of function diagnosed as 61%. Also, the digestive function after consuming greasy food is still not fully balanced.

Table 1. Indicator for the chief complaint filled out by the patient herself. The level of discomfort worsens as it reaches 5.

Symptoms	1st November 21, 2019	2nd December 21, 2020	3rd February 5, 2020	4th June 26, 2020
Intestinal metaplasia	5	3	2	0
Atrophic gastritis	5	3	1	0
Dyspepsia	5	3	0	0
Abdominal distension	5	4	1	0
Gallbladder pain	4	2	1	0

Consideration

The exact cause of intestinal metaplasia has not been identified in modern medicine. It can be assumed that it is simply a process of aging, and has been estimated that cells are transformed during the process of recovery while inflammation is repeated. Aging deteriorates the ability of antioxidant enzymes, and cell membranes are easily damaged due to increased amount of active oxygen.[4] The results of experiments by Dr. Otto Heinrich Warburg, a Nobel Prize winner in Germany, revealed that gas exchange through capillaries decreases due to changes in atmospheric pressure,

and cells die out or can be differentiated into cancerous when oxygen saturation falls below 65%.[5] Intestinal metaplasia is also acknowledged as a pre-cancerous cell in modern medicine, and some believe that a decrease in oxygen saturation may be the cause of its transformation into cancerous cells based on precedents. In addition, it is thought that the deteriorated antioxidant enzyme activity due to aging causes damage to the cell wall, causing stress to the gastric mucosa, and atrophic gastritis may have the potential to develop into intestinal metaplasia. No complete cure of intestinal metaplasia has been reported in modern medicine yet. According to the theory of epigenetics, the expression of genes varies depending on the surrounding environment and lifestyle, and inappropriate lifestyle and excessive stress can inhibit normal gene expression and cause degeneration of cell membranes or diseases such as intestinal metaplasia.[6] On the other hand, it seems reasonable to think that normal gene expression can restore cell function if proper lifestyle, diet, and stress are maintained appropriately, and it is thought that this case demonstrated improvement in intestinal metaplasia using an epigenetic approach.

Substances with strong detoxifying power capable of performing the role of antioxidant enzymes that decrease after the age of 40 are considered to be the major talking point of longevity as well as cell health. Thus, in this respect, it has been reported that Cyaplex-A contains excellent naturally-derived plant nutrients, and one of its components, cyanidin, particularly has an antioxidant function.[7] Euphaplex contains all the essential noeupha fatty acids, and they must not be oxidized during the manufacturing process since they are an essential material for cell membranes and are required in sufficient content for effective use.[8]

The function of parietal cells that secrete gastric acid also becomes dysfunctional in the mucosal area that have progressed to intestinal metaplasia, causing decreased secretion of gastric acid. Since the patient introduced in this case experienced belching and abdominal distension, it can be seen that the hypoacidity persisted for a long time. It has been reported that epigallocatechin gallate (EGCG), a polyphenol contained in Heartberry Black, has diverse functions including glucose metabolism, activity regulation of α-amylase and α-glucosidase, and protection of internal organs, and [9] there is a possibility that this may have helped to improve declined digestive function caused by hypoacidosis.

Although this demonstrates only a single case of a patient using OCNT, this report has been made with the patient's consent as it seems reasonable to think that it can be another alternative for patients with the same disease.

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