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Treatment Options for Patients With Irritable Bowel Syndrome & Comorbid Depression

Elizabeth Morton
University of North Dakota

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**Introduction**

Irritable bowel syndrome (IBS) is a functional gastrointestinal disorder (FGID) that is classically characterized by recurrent abdominal pain or discomfort associated with alteration in bowel habits. IBS is subdivided into three subtypes: IBS with predominant diarrhea (IBS-D), IBS with predominant constipation (IBS-C), and IBS with equal distribution of diarrhea and constipation (IBS-M). The pathophysiology of IBS is complex, however it is probable that dysfunction of the brain-gut pathways contributes to the appearance of disease.

**Statement of the Problem**

Although IBS & depression are common comorbidities of one another, there is still uncertainty on how to best treat these patients. The availability of effective treatments for IBS is limited and there is a need for better treatment options. There is also uncertainty regarding to whether IBS suppresses a patient’s depression versus depression exacerbating the IBS symptoms.

**Literature Review**

**PATHOPHYSIOLOGY OF IBS AND DEPRESSION**

The pathophysiology of IBS is complex, however it is probable that dysfunction of the brain-gut pathways contributes to the appearance of disease. These with IBS & depression display an imbalance of the inflammatory response, which then leads to the induction of the corresponding digestive and psychiatric symptoms. Some IBS patients have been found to have altered gut microbiota (Muscio, 2016) and it is still uncertain whether this is due to a change in gut microbiota or co-morbid depression.

**WHAT ARE THE CAUSAL MECHANISMS FOR TRIGGERS OF IBS SYMPTOMS?**

Triggering of IBS symptoms is multifaceted, with each patient having their own triggering factors. These may include dietary factors, emotional stress, physical activity, and medication use. The gut microbiota plays a role in the development of IBS symptoms, with some studies showing an altered gut microbiota in patients with IBS.

**WHAT ARE THE BEST TREATMENT OPTIONS FOR PATIENTS WITH IBS & COMORBID DEPRESSION?**

There is no standardized method to cure IBS. For some, decreasing the burden of symptoms from IBS may be as simple as increasing physical activity & dietary modifications. Patients are usually advised to follow the low FODMAP diet, as it is a beneficial treatment of IBS. TCAs can improve global symptoms of IBS and there is insufficient evidence to confirm the effectiveness of selective serotonin reuptake inhibitors (SSRIs). Some patients may still prefer SSRIs solely for their depressive symptoms. Probiotics have been studied to improve IBS symptoms via their effects on intestinal permeability, visceral hypersensitivity, gastrointestinal motility, intestinal permeability & microbiota (Vannoy, et al, 2014). This is especially with the finding that patients with high trait rumination, which is a common psychological measure in IBS, may benefit more from probiotics in decreasing abdominal pain when compared to Lactobacillus strain (Vannoy, et al, 2014). Other pharmacological options for symptom relief include antidepressants for the IBS-D subtypes, and laxatives for the IBS-C subtypes.

**Applicability to Clinical Practice**

The pathophysiology of IBS is complex, however it is probable that dysfunction of the brain-gut pathways contributes to the appearance of disease. These with IBS & depression display an imbalance of the inflammatory response, which then leads to the induction of the corresponding digestive and psychiatric symptoms. Some IBS patients have been found to have altered gut microbiota (Muscio, 2016) and it is still uncertain whether this is due to a change in gut microbiota or co-morbid depression.

**Discussion**

The pathophysiology of IBS is complex, however it is probable that dysfunction of the brain-gut pathways contributes to the appearance of disease. These with IBS & depression display an imbalance of the inflammatory response, which then leads to the induction of the corresponding digestive and psychiatric symptoms. Some IBS patients have been found to have altered gut microbiota (Muscio, 2016) and it is still uncertain whether this is due to a change in gut microbiota or co-morbid depression.

**What is the link between IBS & depression?**

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**What are the causal mechanisms for triggers of IBS symptoms?**

Triggering of IBS symptoms is multifaceted, with each patient having their own triggering factors. These may include dietary factors, emotional stress, physical activity, and medication use. The gut microbiota plays a role in the development of IBS symptoms, with some studies showing an altered gut microbiota in patients with IBS.

**What are the best treatment options for patients with IBS & comorbid depression?**

There is no standardized method to cure IBS. For some, decreasing the burden of symptoms from IBS may be as simple as increasing physical activity & dietary modifications. Patients are usually advised to follow the low FODMAP diet, as it is a beneficial treatment of IBS. TCAs can improve global symptoms of IBS and there is insufficient evidence to confirm the effectiveness of selective serotonin reuptake inhibitors (SSRIs). Some patients may still prefer SSRIs solely for their depressive symptoms. Probiotics have been studied to improve IBS symptoms via their effects on intestinal permeability, visceral hypersensitivity, gastrointestinal motility, intestinal permeability & microbiota (Vannoy, et al, 2014). This is especially with the finding that patients with high trait rumination, which is a common psychological measure in IBS, may benefit more from probiotics in decreasing abdominal pain when compared to Lactobacillus strain (Vannoy, et al, 2014). Other pharmacological options for symptom relief include antidepressants for the IBS-D subtypes, and laxatives for the IBS-C subtypes.

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