

CLAIMS

1. A system comprising:
 - a patient electronic device comprising:
 - an input device;
 - a cognitive behavioral therapy (CBT) module;
 - data processing hardware; and
 - memory hardware in communication with the data processing hardware, the memory hardware storing instructions that when executed on the data processing hardware cause the data processing hardware to perform operations comprising:
 - executing a digital therapeutic configured to treat symptoms associated with migraines experienced by a patient, wherein executing the digital therapeutic for the patient comprises:
 - obtaining a plurality of data, wherein the plurality of data is obtained from (i) first sensors associated with the patient electronic device, (ii) the patient via the input device of the patient electronic device, and (iii) a remote server;
 - weighting the plurality of data to provide a plurality of weighted data;
 - generating a migraine forecast prediction for the patient based on the plurality of weighted data;
 - determining a recommended dosage of a migraine-treating medication for the patient based on the migraine forecast prediction, the migraine-treating medication including one of a triptan or a calcitonin gene-related peptide (CGRP) inhibitor;
 - instructing an administration unit to administer an administration dosage of the migraine-treating medication to the patient based on the recommended dosage; and
 - displaying a series of presentations via the CBT module as a cognitive thinking game interface based on the migraine forecast prediction and/or the plurality of weighted data,

wherein the plurality of data obtained from the patient via the input device of the patent electronic device comprises a migraine log;

wherein the migraine log comprises a plurality of logged migraine interface elements, each of the plurality of logged migraine interface elements associated with one of a plurality of migraines; and

wherein each logged migraine interface element includes, for the migraine associated with the migraine interface element, one or more of: (i) a date; (ii) a duration; (iii) a migraine intensity indicator; (iv) a successful non-pharmacological relief strategy; and (v) a migraine-treating medication log.

2. The system of claim 1, further comprising the administration unit, wherein the administration unit is configured to administer the administration dosage of the migraine-treating medication to the patient based on the instructions.
3. The system of claim 2, wherein the administration unit performs operations comprising:
administering the administration dosage of the migraine-treating medication to the patient.
4. The system of claim 1,
wherein the plurality of data is further obtained from second sensors associated with the patient; and
wherein the second sensors comprise one or more of: (i) a heart rate monitor, (ii) a blood pressure monitor, (iii) a sleep monitor, (iv) an electrodermal activity monitor, (v) a skin temperature sensor, and (vi) a sweat monitor.
5. The system of claim 1, wherein the first sensors associated with the patient electronic device comprise one or more of: (i) an accelerometer, (ii) a proximity sensor, (iii) an activity monitor, and (iv) a location system.

6. The system of claim 1, wherein the plurality of data obtained from the remote server comprise one or more of: (i) a temperature, (ii) a humidity, (iii) a cloud cover, and (iv) a barometric pressure.
7. The system of claim 1, wherein weighting the plurality of data comprises assigning a first weight to a first data of the plurality of data and a second weight different than the first weight to a second data of the plurality of data.
8. The system of claim 1, wherein the administration unit comprises one or more of: (i) a delivery pump, (ii) an injection unit, (iii) an implant, (iv) an oral absorption unit, (v) an inhaler, and (vi) a nasal injector.
9. The system of claim 1, wherein determining the recommended dosage of the migraine-treating medication comprises:
 - determining whether medication overuse is suspected;
 - if medication overuse is suspected, removing or limiting a primary agent from the recommended dosage; and
 - if medication overuse is not suspected, including the primary agent in the recommended dosage, wherein the primary agent is personalized for the patient based on the plurality of data.