education and specialization of relatively few professionals who need to respond to the healthcare demands of a large number of patients. This "bottleneck" is a major reason for the ever-increasing cost of medical care in modern developed economies.

Further, in medical informatics brings together people from diverse backgrounds and levels of medical knowledge, but since medical informatics system are implemented in hospitals and other health centre's independently due to same there is no information sharing between the hospitals.

For the reasons stated above, which will become apparent to those skilled in the art upon reading and understanding the specification, there is a need in the art for an automated integrated system, method and platform which helps in managing the total health care services with the inclusion of drug discovery and clinical trials.

The present disclosure provides a web based integrated informatics system for healthcare services comprising:

at least one client device including at least one interactive user interface module to provide access to the system, wherein the interactive user interface module allows the user to interact with the system by way of providing or searching health related information or services as per user's requirements;

at least one server including at least one control logic module, wherein the control logic module assists and/or suggests a health care services based on the user's requirement;

a plurality of databases for maintaining a plurality of health care related information for users, wherein the users including one or more health care experts; and

a communication network integrating the server, the client device and the database to communicate with each other;

wherein the system is configured to receive information or request sent by one or more client devices, where the received information/s or request/s are processed by the control logic of the server, where the control logic processes the information or request based on the business and data logics with the all available databases, the processed request is integrated with relevant healthcare information or services and received by the client device.

Brief description of the Invention

Figure 1 is a general block diagram illustrating client-server architecture that is suitable for practicing the embodiment of the present invention.

Figure 2 illustrates a functional block diagram of a virtual specialty hospital system according to one embodiment of the present invention.

Figure 3 illustrates a high-level architecture of a virtual specialty hospital system according to one embodiment of the present invention.

I Claim:

1. A web based integrated informatics system for healthcare services comprising:

at least one client device including at least one interactive user interface module to provide access to the system, wherein the interactive user interface module allows the user to interact with the system by way of providing or searching health related information or services as per user's requirements;

at least one server including at least one control logic module, wherein the control logic module assists and/or suggests a health care services based on the user's requirement;

a plurality of databases for maintaining a plurality of health care related information for users, wherein the users including one or more health care experts; and

a communication network integrating the server, the client device and the database to communicate with each other;

wherein the system is configured to receive information or request sent by one or more client devices, where the received information/s or request/s are processed by the control logic of the server, where the control logic processes the information or request based on the business and data logics with the all available databases, the processed request is integrated with relevant healthcare information or services and received by the client device.

wherein the server is configured for conducting Virtual Research & Development from the basic Drug Discovery right from identification of lead molecule stage for a specific first line therapy for a specific disease and also to bring out a desired result which not only can be tested in the laboratory, but also has a large pool of references from the peer-reviewed first rate scientific journals based on real time online intelligent search.

2. The web based integrated informatics system of claim 1, wherein the server is coupled one or more active modules, wherein the user interface module allows the user to enter functional biological data into database for developing increasingly sophisticated computational approaches to virtual medical research for a new product discovery and also allows to analyze and recommend supplementary therapies for the existing products or products in the pipeline.

3. The web based integrated informatics system of claim 1, wherein the server is coupled to one or more active modules including (1) Virtual Medical Representative (VMR) which interacts with multi-national companies, doctors and hospitals for clinical studies, e-commerce etc, (2) Clinical Research Org (CRO) which conducts clinical studies and trials based on FDA requirement and crunches the time period in the total drug discovery and launch of new molecules,products,devices, (3) Multi-National Hosting (MNC) which conducts basic new drug research, their clinical studies and trials along with

~~the marketing of their products and services (drugs, equipment, diagnostics and related services) to doctors and hospitals via VMR.~~

~~4. The web based integrated informatics system of claim 1, wherein the server is configured to enable doctors, scientists, pharmaceutical/healthcare companies to form an intelligent network to host over a common shared world standard of treatment and prevention of life threatening diseases, wherein the system integrates total healthcare services which aids R & D for drug discovery and clinical trials.~~

~~5. The web based integrated informatics system of claim 1, wherein the server is further coupled to provide services to specialist doctors, hospitals through the network which will track information from the backend database and come out with an auto response form most of the requests made by doctors, hospitals and also capable of diverting the communication to the responsible person at any multinational company in order to provide answers to customer request at any given time and thereby accumulating more and more information~~

~~6. The web based integrated informatics system of claim 1, further coupled to tele-medicine and tele-diagnostic modules for, diagnostic consulting with second opinion from super specialist doctors.~~

~~7. The web based integrated informatics system of claim 1 provides a opinion over consulting and online transfer of patient records, new diagnostic and treatment profiles across the world.~~

~~8. The web based integrated informatics system of claim 1, wherein the database includes drug related information, health expert information, case histories, drug related information, disease related information, clinical study records, medical discovery records, experimental findings and the like.~~

~~9. The web based integrated informatics system substantially as herein described with reference to the above mentioned description and the accompanying drawings.~~

CLAIMS

1. A web based integrated informatics system for healthcare services comprising :

at least one client device including at least one interactive user interface module to provide access to the system, wherein the interactive user interface module allows the user to interact with the system by way of providing or searching health related information or services as per user's requirements;

at least one server including at least one control logic module, wherein the control logic module assists and/or suggests a health care services based on the user's requirement;

a plurality of databases for maintaining a plurality of health care related information for users, wherein the users including one or more health care experts; and

a communication network integrating the server, the client device and the database to communicate with each other;

wherein the system is configured to receive information or request sent by one or more client devices, where the received information/s or request/s are processed by the control logic of the server, where the control logic processes the information or request based on the business and data logics with the all available databases, the processed request is integrated with relevant healthcare information or services and received by the client device.

2. The web based integrated informatics system of claim 1, wherein the server is coupled one or more active modules, wherein the user interface module allows the user to enter functional biological data into database for developing increasingly sophisticated computational approaches to virtual medical research for a new product discovery and also allows to analyze and recommend supplementary therapies for the existing products or products in the pipeline.

3. The web based integrated informatics system of claim 1, wherein the server is coupled to one or more active modules including (1) Virtual Medical Representative (VMR) which interacts with multi-national companies, doctors and hospitals for clinical studies, e-commerce etc, (2) Clinical Research Org

(CRO) which conducts clinical studies and trials based on FDA requirement and crunches the time period in the total drug discovery and launch of new molecules,products,devices, (3) Multi-National Hosting (MNC) which conducts basic new drug research, their clinical studies and trials along with the marketing of their products and services (drugs, equipment, diagnostics and related services) to doctors and hospitals via VMR.

4. The web based integrated informatics system of claim 1, wherein the server is configured for conducting Virtual Research & Development from the basic Drug Discovery right from identification of lead molecule stage for a specific first line therapy for a specific disease and also to bring out a desired result which not only can be tested in the laboratory, but also has a large pool of references from the peer-reviewed first rate scientific journals based on real time online intelligent search.

5. The web based integrated informatics system of claim 1, wherein the server is configured to enable doctors, scientists, pharmaceutical/healthcare companies to form an intelligent network to host over a common shared world standard of treatment and prevention of life threatening diseases, wherein the system integrates total healthcare services which aids R & D for drug discovery and clinical trials.

6. The web based integrated informatics system of claim 1, wherein the server is further coupled to provide services to specialist doctors, hospitals through the network which will track information from the backend database

and come out with an auto response form most of the requests made by doctors, hospitals and also capable of diverting the communication to the responsible person at any multinational company in order to provide answers to customer request at any given time and thereby accumulating more and more information

7. The web based integrated informatics system of claim 1, further coupled to tele-medicine and tele-diagnostic modules for, diagnostic consulting with second opinion from super specialist doctors.

8. The web based integrated informatics system of claim 1 provides a opinion over consulting and online transfer of patient records, new diagnostic and treatment profiles across the world.

9. The web based integrated informatics system of claim 1, wherein the database includes drug related information, health-expert information, case histories, drug-related information, disease related information, clinical study records, medical discovery records, experimental findings and the like.