



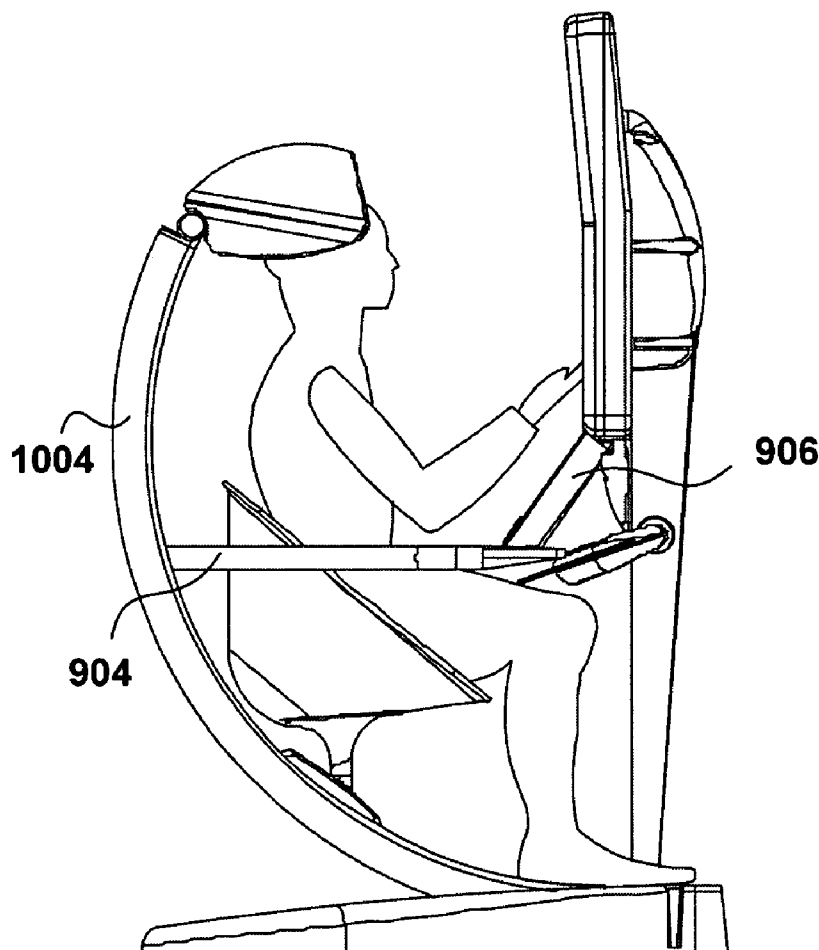
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(19) **United States**(12) **Patent Application Publication****Gatto et al.**(10) **Pub. No.: US 2006/0014586 A1**(43) **Pub. Date: Jan. 19, 2006**(54) **INTEGRAL ERGONOMIC GAMING  
TERMINAL**(52) **U.S. Cl. .... 463/46**(75) **Inventors: Jean-Marie Gatto, London (GB);  
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(US)**(57) **ABSTRACT**

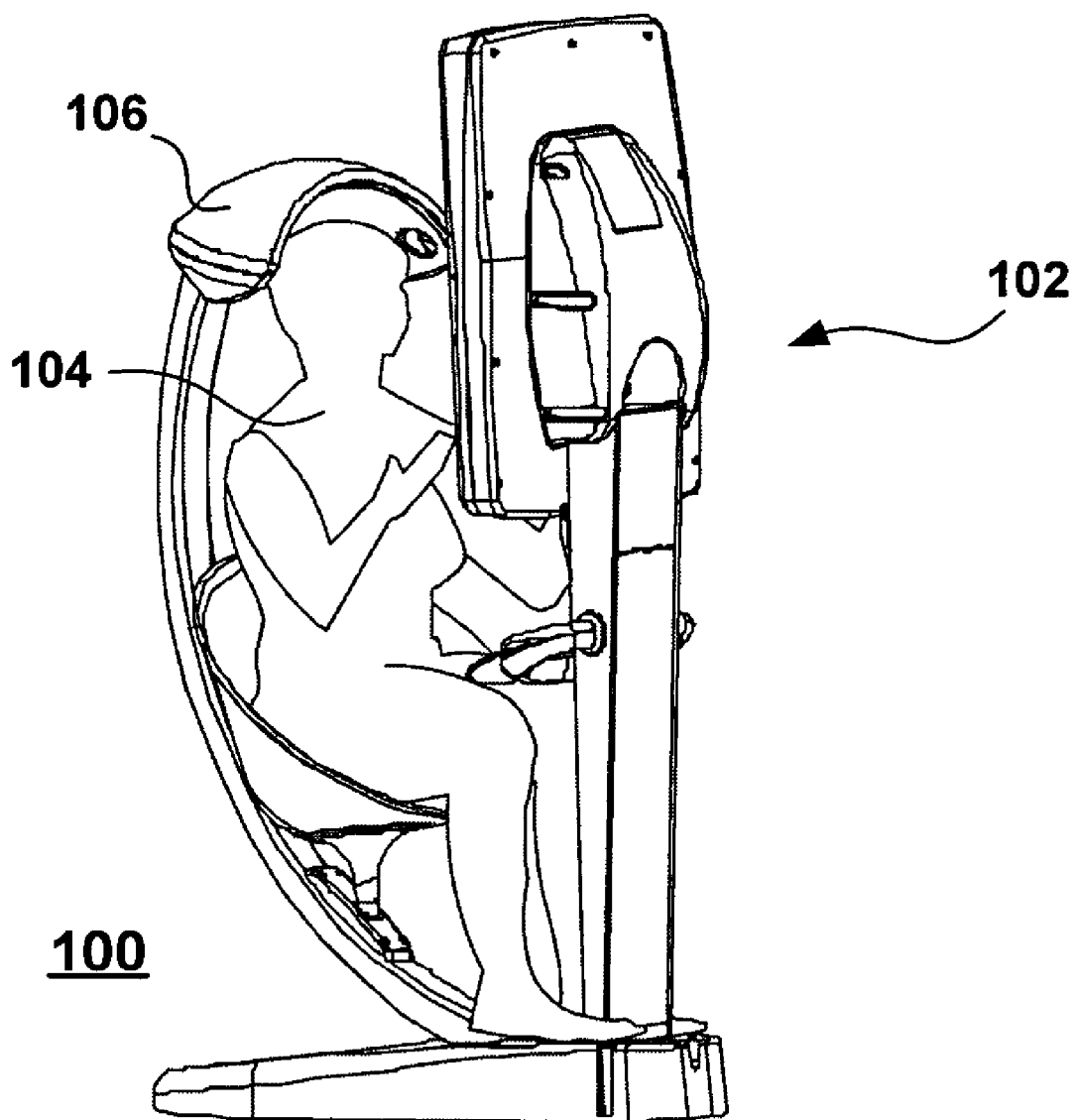
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CA**(21) **Appl. No.: 10/892,541**(22) **Filed: Jul. 14, 2004****Publication Classification**(51) **Int. Cl.  
A63F 9/24 (2006.01)**

An ergonomic adjustable "integral" gaming terminal configured to comfortably surround the player and provide audio isolation from the surroundings. The position and orientation of the various ergonomic elements including the sound volume and video brightness are computer controlled and memorized together with the player profile. A signal may be activated to allow ease of sitting-in and exiting the gaming terminal. Embodiments of the invention accommodate two or more seated players to play as a couple or as a team. The terminal includes body-relaxing devices such as back massage, leg massage and foot massage as well as soothing audio that are available while the player is playing games. Some entertainment and information services may be activated for an additional fee, if a bonus or quota is attained or according to a promotional scheme.

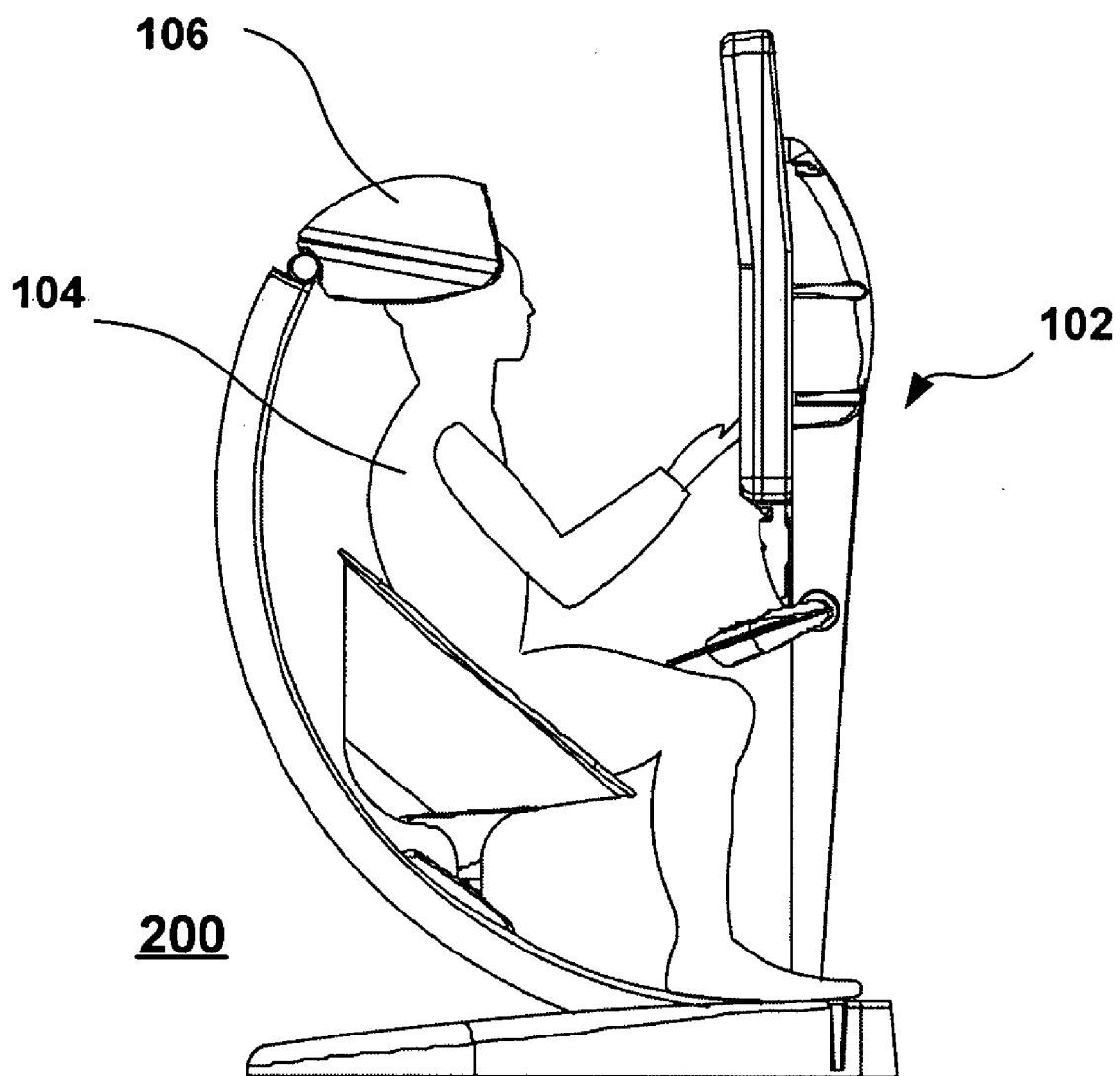






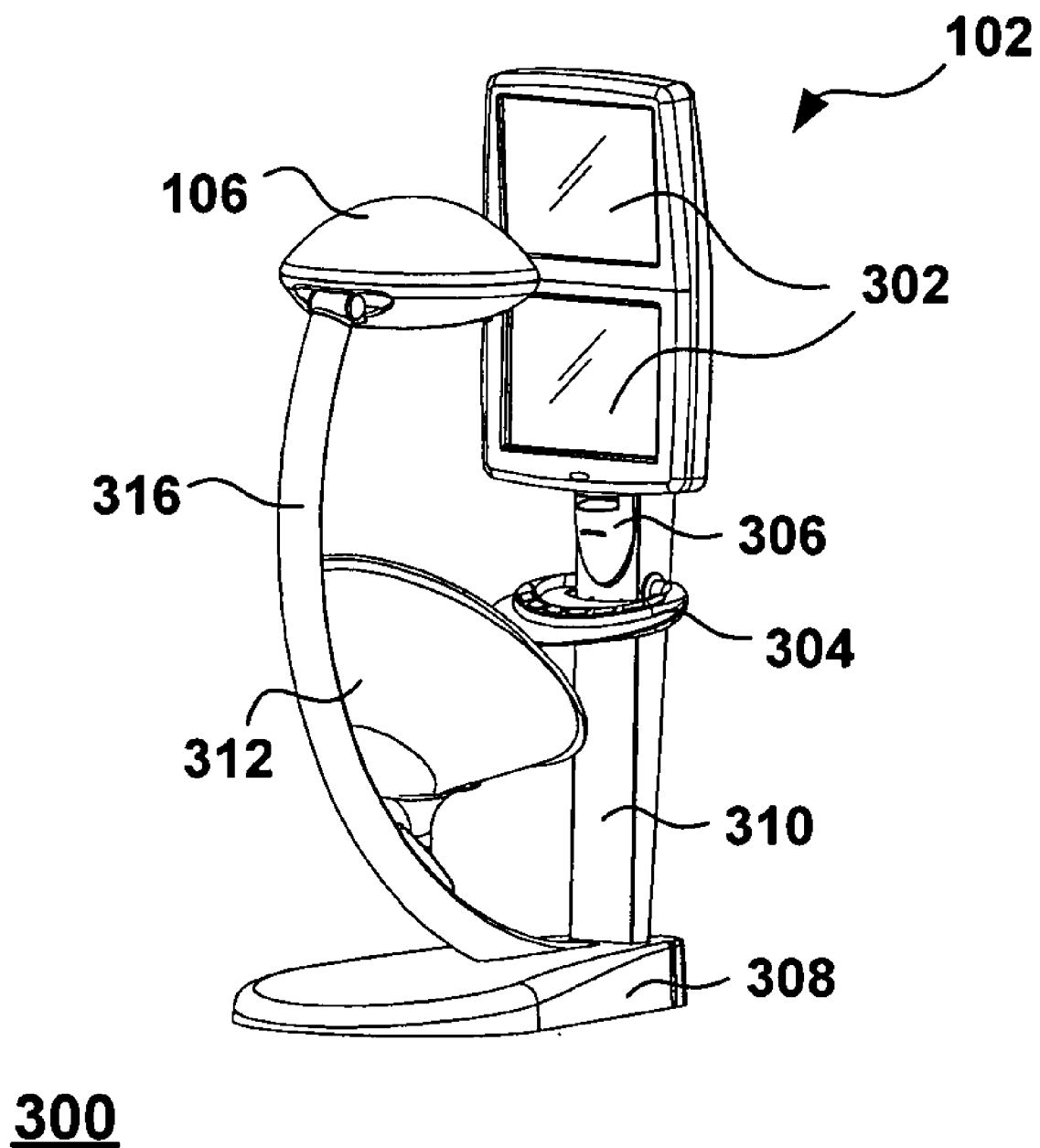
*FIG. 1*





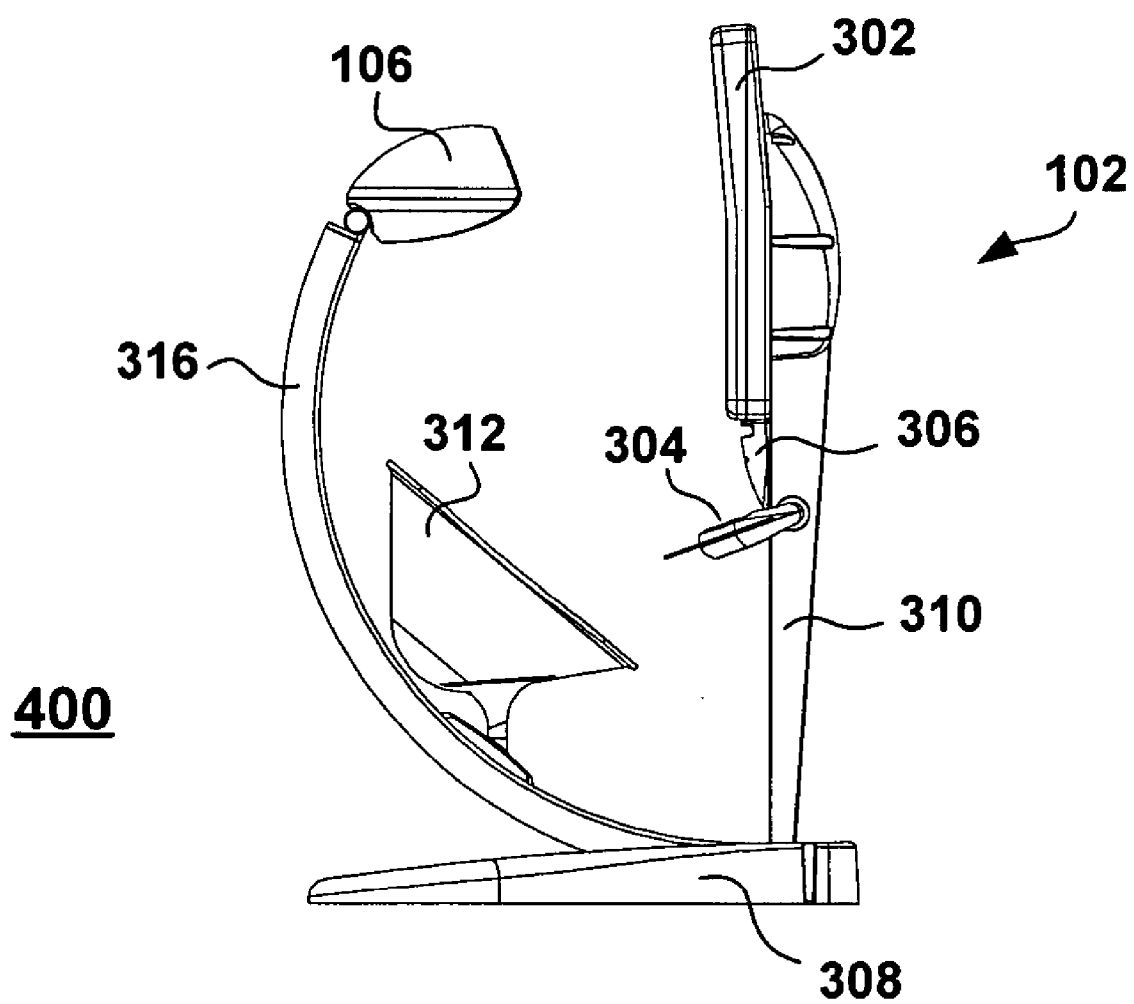
*FIG. 2*





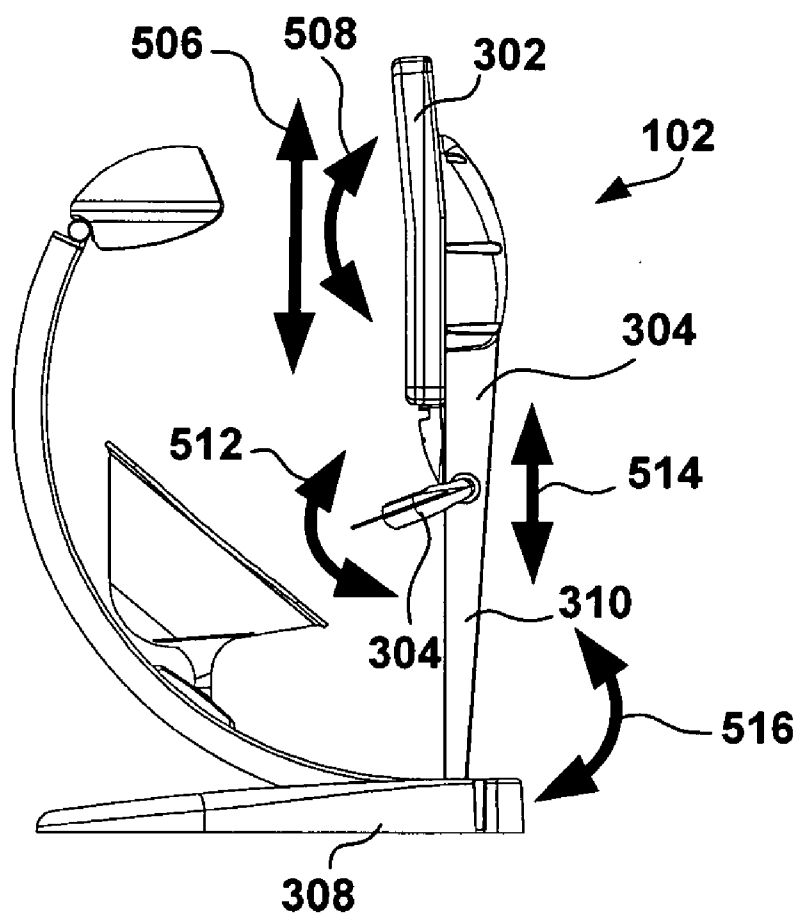
***FIG. 3***





*FIG. 4*

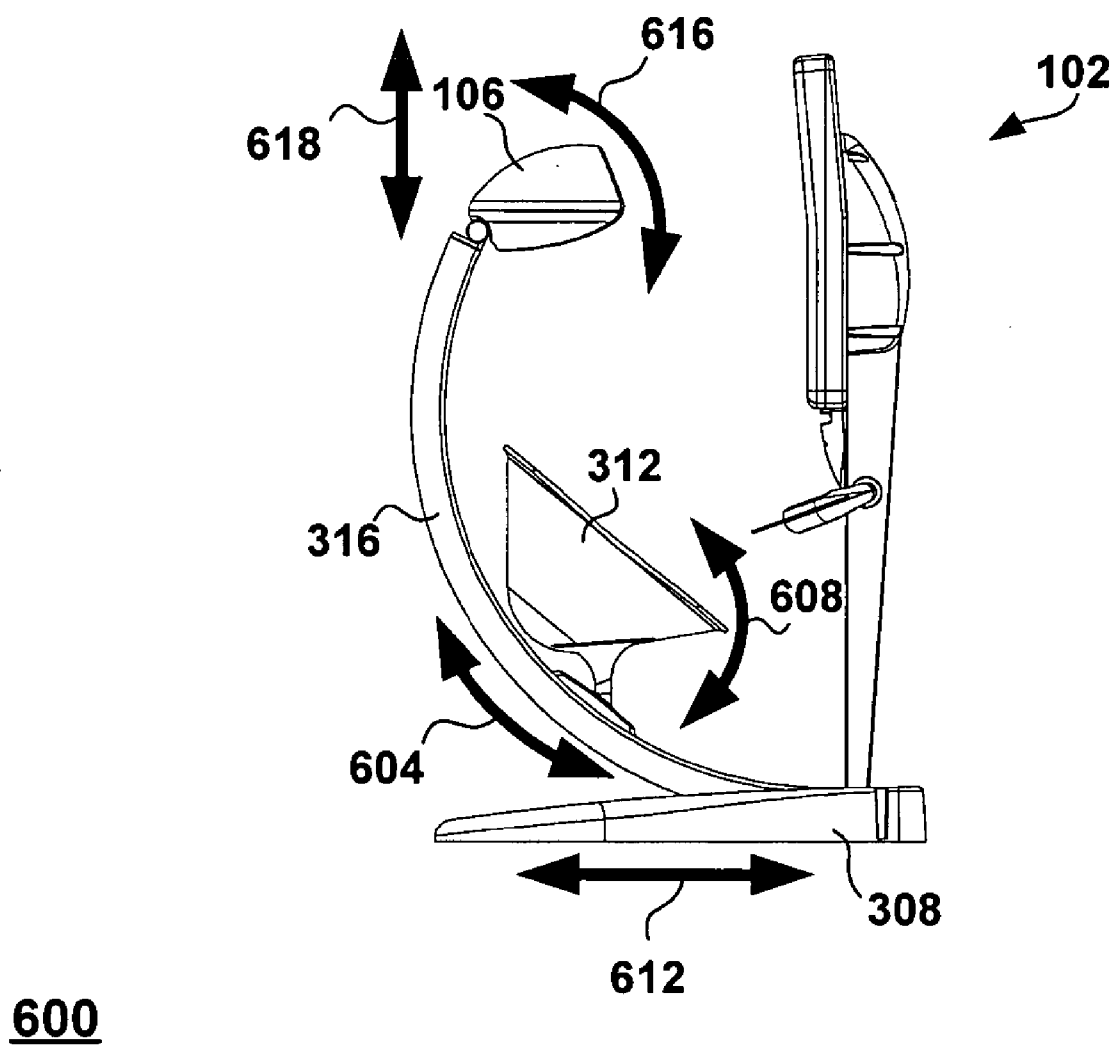




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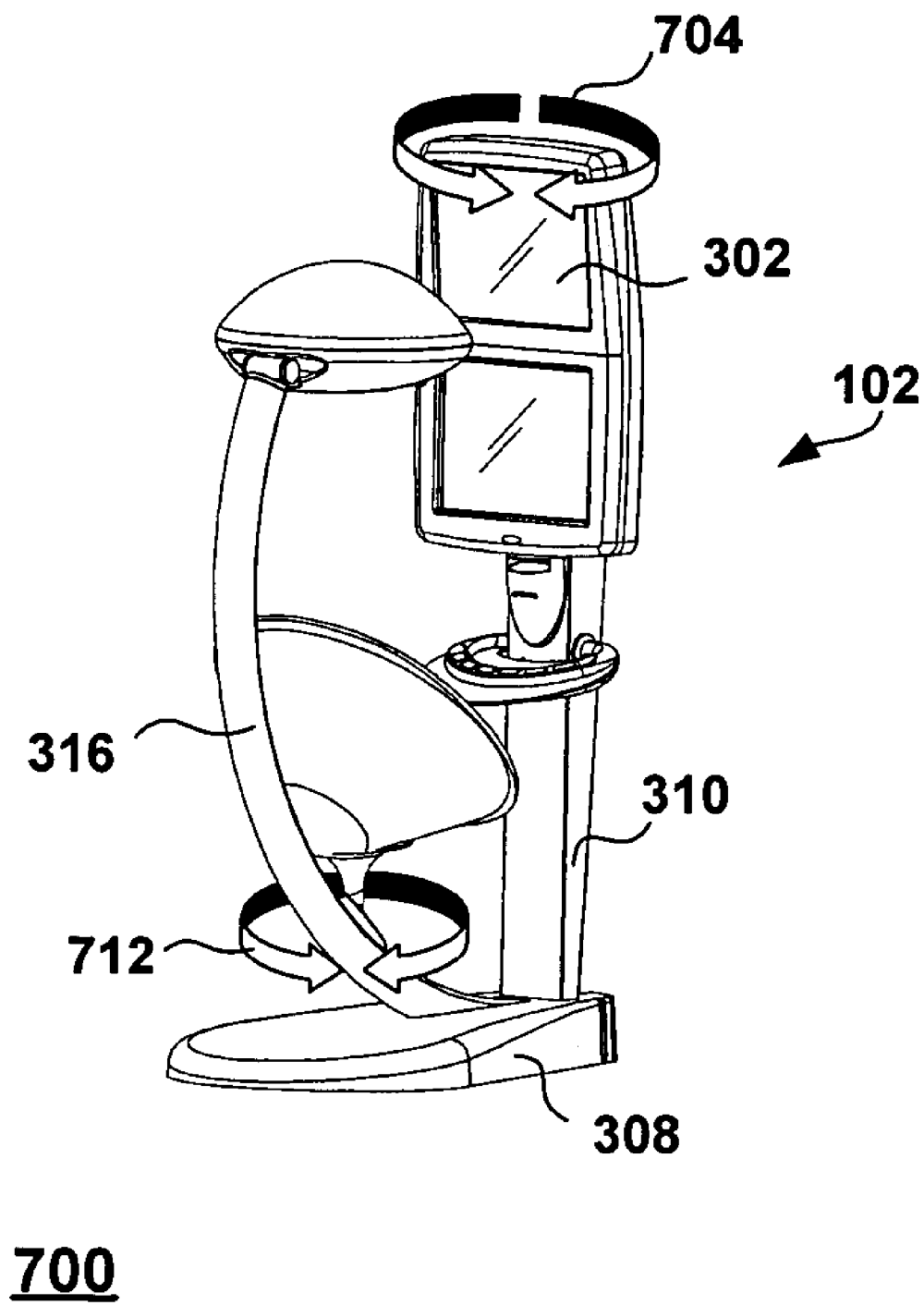
*FIG. 5*





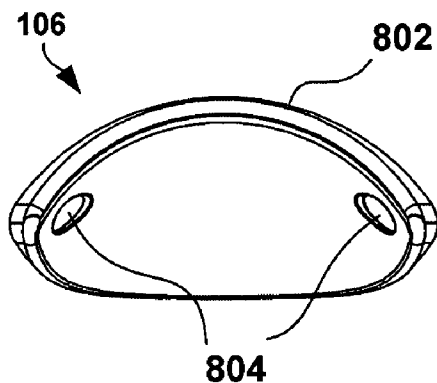
**FIG. 6**



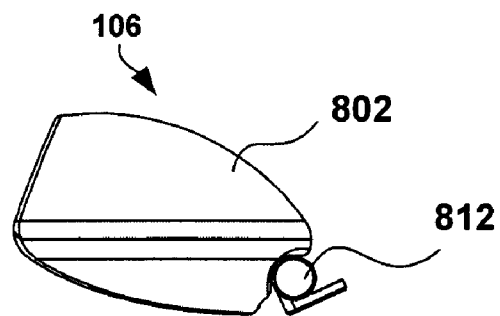


**FIG. 7**

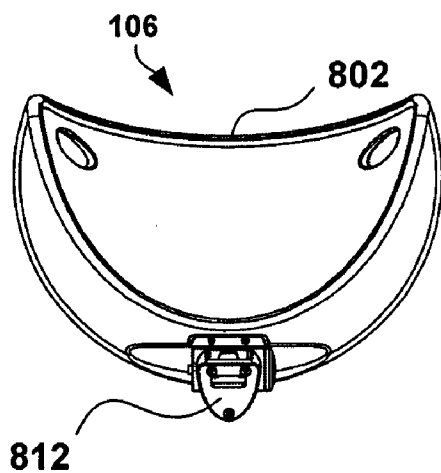




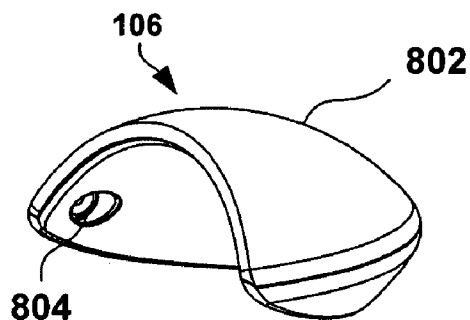
*FIG. 8A*



*FIG. 8B*

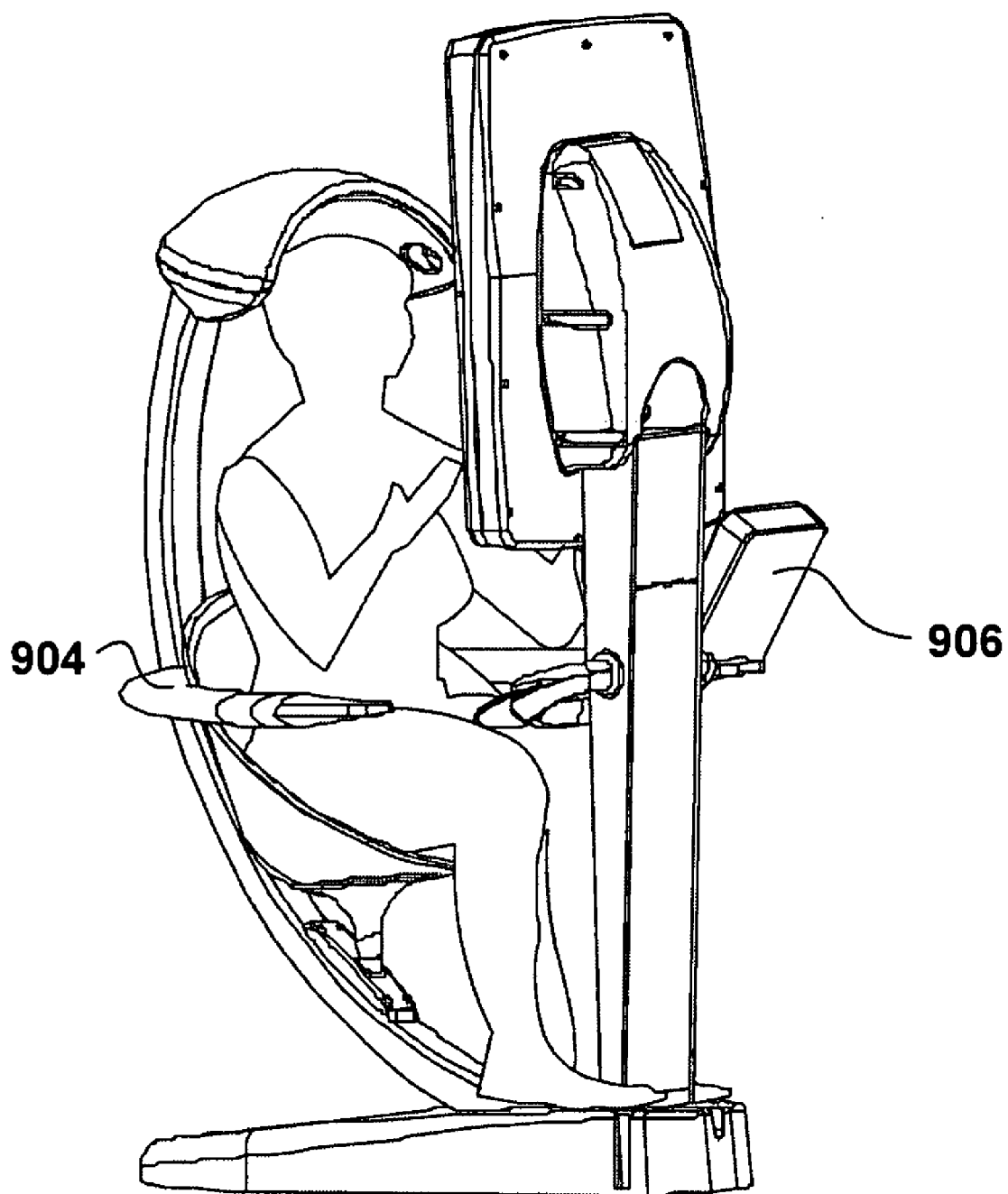


*FIG. 8C*



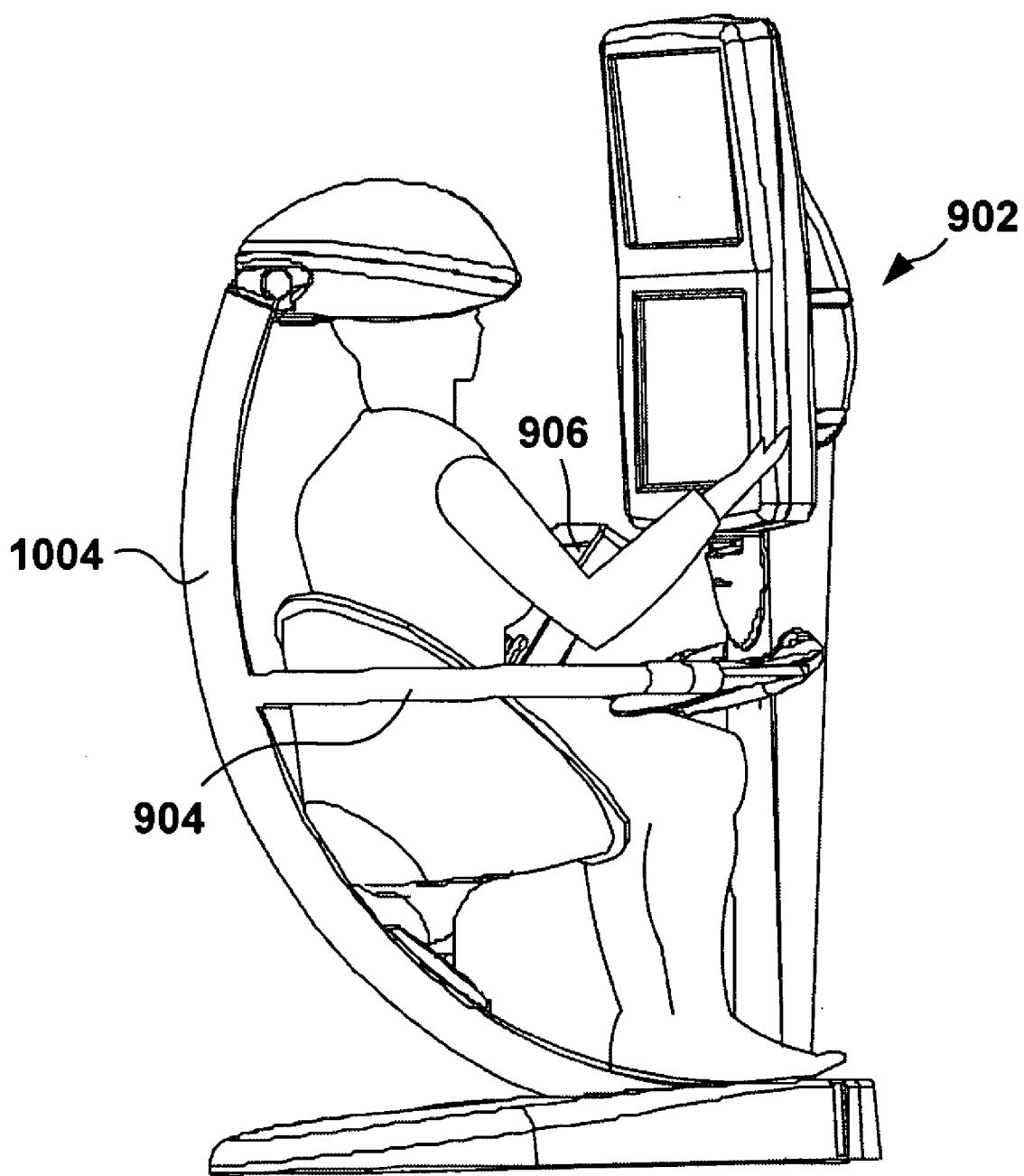
*FIG. 8D*





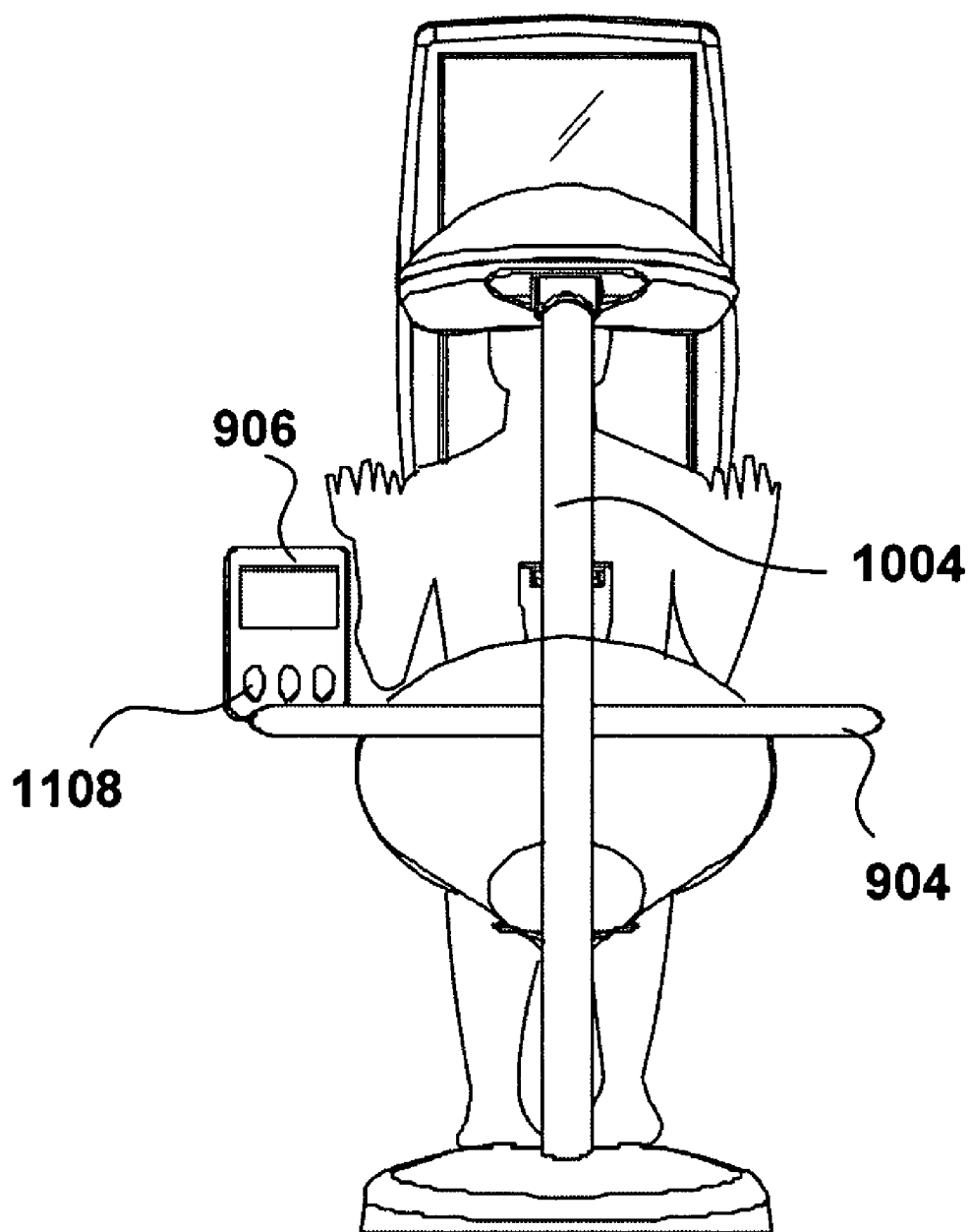
**FIG. 9**





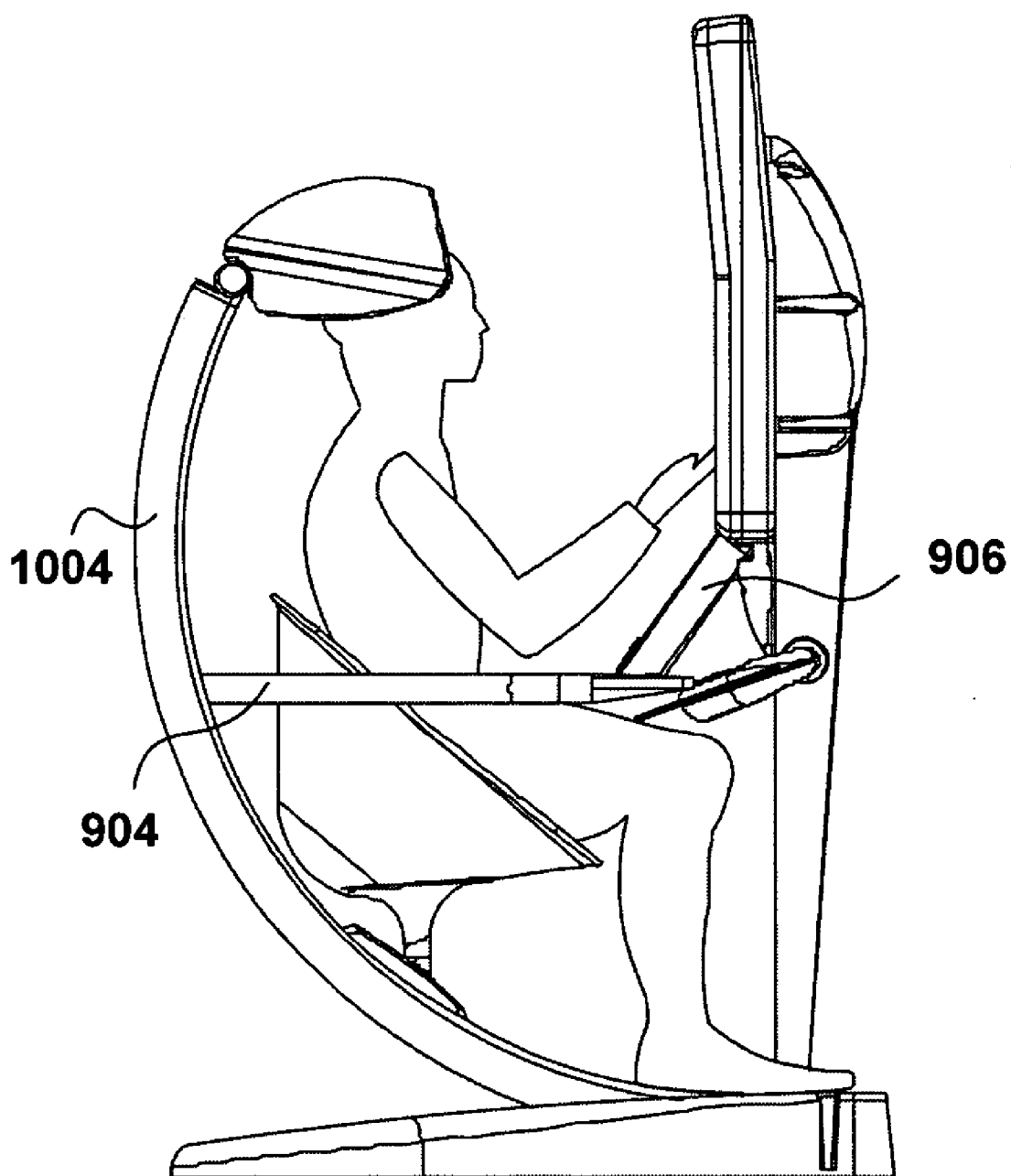
**FIG. 10**





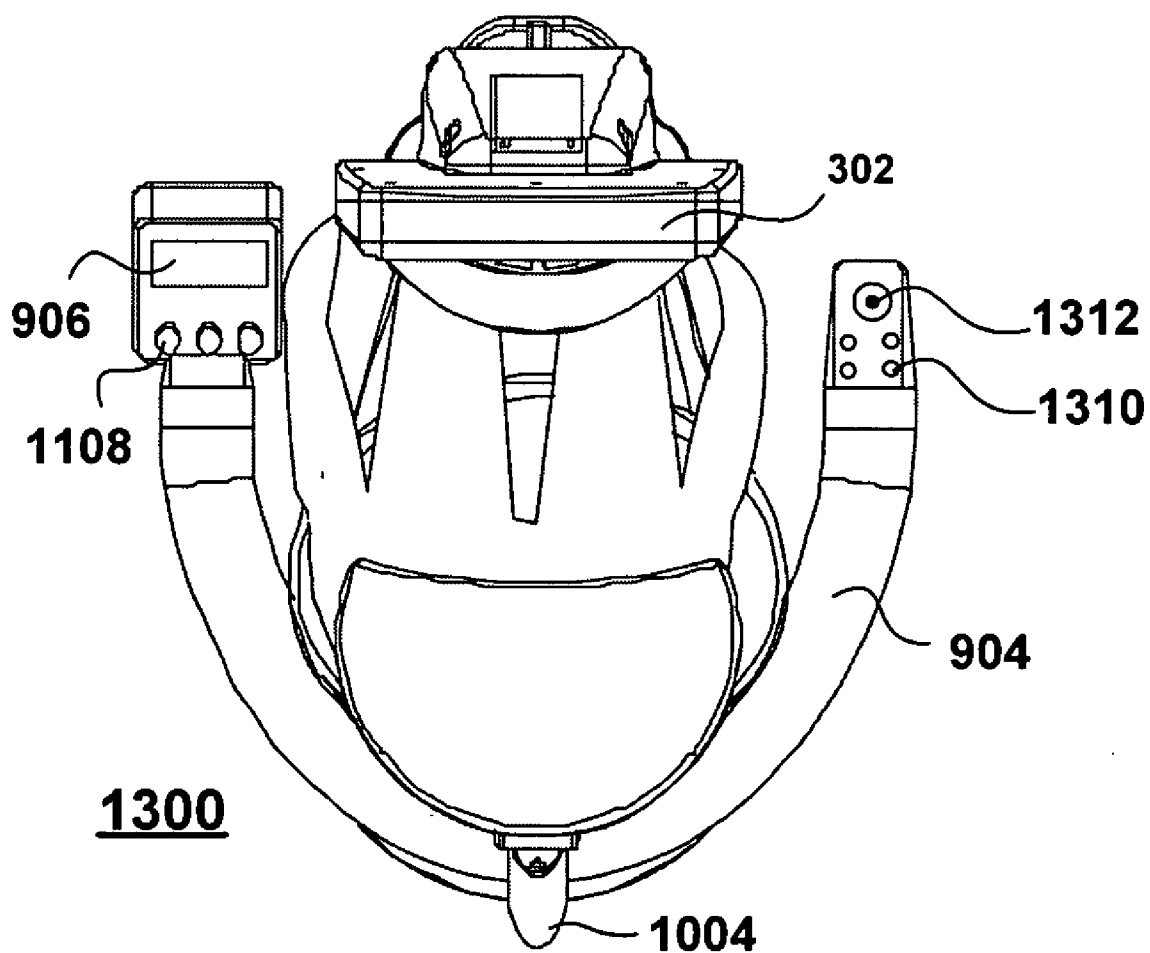
**FIG. 11**





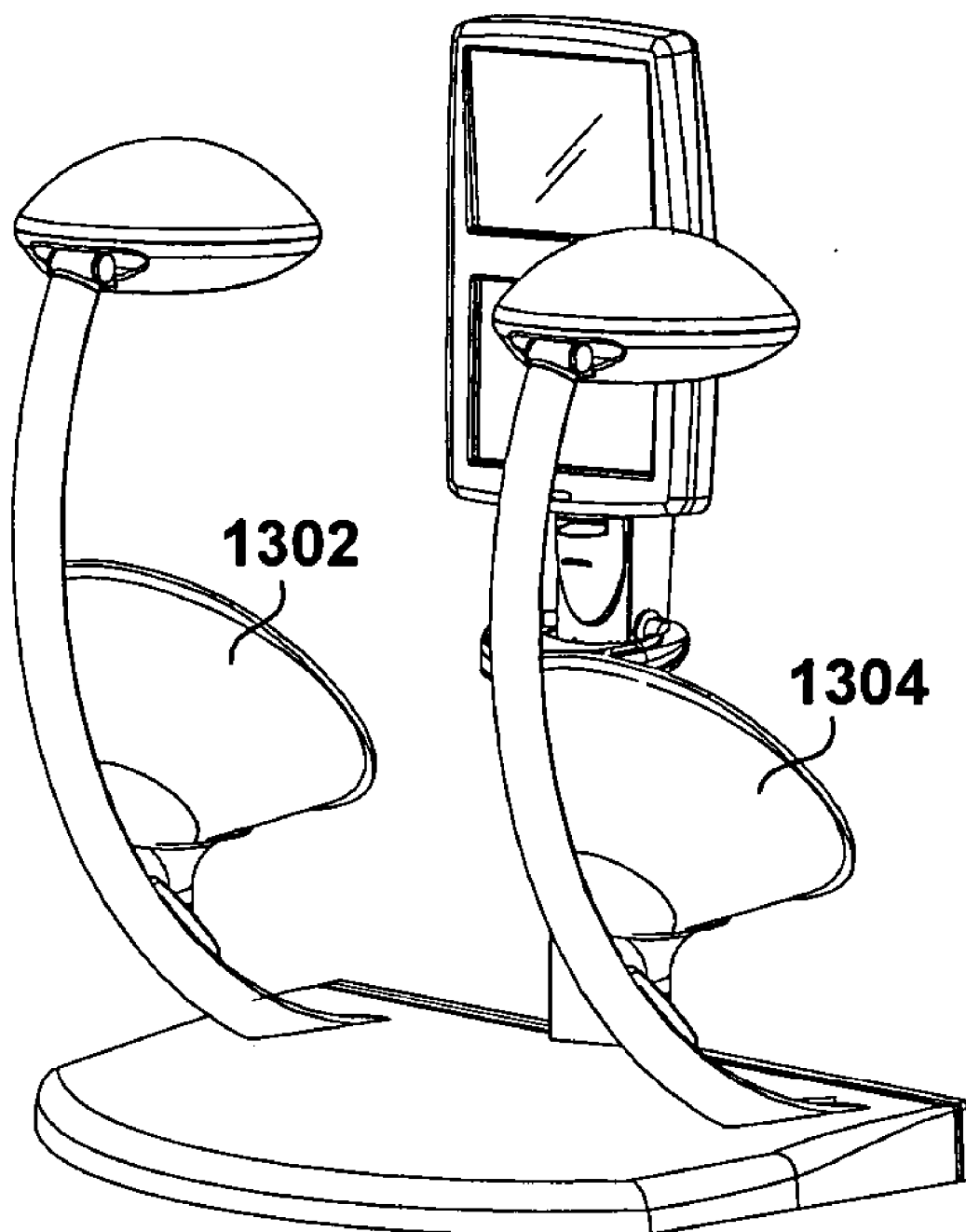
**FIG. 12**





**FIG. 13**





***FIG. 14***



## INTEGRAL ERGONOMIC GAMING TERMINAL

### BACKGROUND OF THE INVENTION

#### [0001] 1. Field of the Invention

[0002] This invention relates generally to the field of casino gaming terminals and, more particularly, relates to an ergonomically designed “integral” gaming terminal configured to comfortably surround a player.

#### [0003] 2. Copyright Notice/Permission

[0004] A portion of the disclosure of this patent document contains material that is subject to copyright protection. The copyright owner has no objection to the facsimile reproduction by anyone of the patent document or the patent disclosure as it appears in the Patent and Trademark Office patent file or records, but otherwise reserves all copyright rights whatsoever. The following notice applies to the software and data as described below and in the drawings hereto: Copyright 2004, Cyberscan Technology Inc., All Rights Reserved.

#### [0005] 3. Description of the Related Art

[0006] Traditional gaming terminals such as found in casinos are designed on the omnipresent 3-piece model comprising 3 separate elements. Gaming terminals based on this 3-piece model include a base (or bench) that is usually made of wood, a gaming cabinet that sits on top of the base, and a chair. Some manufacturers such as WMS Gaming are now proposing ergonomically improved cabinets such as described in U.S. Pat. No. 6,334,612 entitled Ergonomically Designed Gaming Machine. Other suppliers are proposing a 2-piece gaming terminal in which the base and the gaming cabinet are combined. In any event, it appears that, for current gaming terminals, the player's comfort in terms of what may be called body comfort, the player's video viewing comfort, the player's audio comfort and the design of the player interaction means (the player may play on the gaming terminal for a considerable number of hours) is always considered as an afterthought. In addition, players using such conventional gaming terminals are often subjected to the characteristic surrounding casino clatter and din, which may displease or even disturb music/sound aficionados accustomed to the high-quality sound available on current multimedia PCs and DVD home theaters.

[0007] Also, when two persons wish to play on one gaming terminal as a team or when a second person acts as a supporter, such as is the case in casinos located in areas attracting younger generation of players (beach casinos, holiday resorts, etc.) in which the players like to try their luck as a couple rather than individually, there are no provisions in conventional gaming terminals for accommodating a second player comfortably for an extended period of time.

[0008] Moreover, as computer controllers integrated in gaming terminals are rapidly adopting the generic PC architecture and windowing software such as Microsoft windows and Linux (whether embedded or not) and that the gaming industry is rapidly shifting to cashless payment operation, the cost of gaming machines hardware is declining.

[0009] There is, therefore, a need for new gaming terminals that address the comfort and usability issues discussed above. It is also clear that these issues offer the opportunity

for gaming terminal manufacturers to differentiate their products and gain a competitive advantage by offering gaming terminals of greater appeal and increased functionality.

### SUMMARY OF THE INVENTION

[0010] Accordingly, an object of the present invention is to provide an “integral” gaming terminal design configured to offer the player a comfortable, private, relaxing and entertaining gaming experience. The gaming experience may be augmented by personal services such as TV viewing and Internet access. The gaming terminals according to embodiments of the present invention may be networked within a distributed gaming system and may communicate in many ways with other machines, such as via a peer-to-peer communication protocol with other gaming terminals and/or with other secure web services. Such gaming terminals may participate in bonusing and progressive schemes locally within the gaming operator premises or globally with other gaming operations located in other geographic areas.

[0011] The gaming terminals according to embodiments of the present invention may be reserved in advance (for high rollers, for example). Alternatively, such gaming terminals may be configured to keep the player's identity and personal information private. Players of gaming terminals according to embodiments of the present invention may choose their own music or soothing sounds when playing. They may also securely communicate with others (players or PC users) within or outside the gaming premises using instant messaging technology such as Microsoft MSN/Windows Messenger that features text messaging, a personal contact list, voice communication, webcam communication and photo transfer (via file transfer), augmented with a personal calendar for organizing contact time and gaming events. The present gaming terminal may have the capability to process video and sound.

[0012] When a player is sitting in a gaming terminal and has not played any games or utilized some other functionality of the terminal for a predetermined period of time that may be determined by the casino operator, the gaming terminal may transmit a signal to both the player and the operator to prevent prolonged non-play time. Although the present gaming terminal may include soothing and relaxing services (such as massaging in the chair and leg rest, for example), the player should not stop playing, and in particular should be prevented from falling asleep.

[0013] According to an embodiment of the present invention, the gaming terminal may be a one-piece apparatus that may include a video display or multiple displays, interactive devices (such as, for example, touch screen(s), buttons, keypad(s), joystick(s) and the like), payment instruments (cash or cash-less), a control computer, a chair and an overhead sound system. The overhead sound system provides the player with a private digital quality audio source and isolates the player from the surrounding ambient casino noise. Such a gaming terminal may include a headset that may feature mobile opaque or semi-transparent panels to isolate the player from parasitic light. Alternatively, players having a personal headset such as a Bluetooth (for example) mobile phone headset may use it to listen to the sound produced by the gaming terminal via a dedicated Bluetooth (or functionally similar) link. Alternatively, again, players



may plug their personal MP3/WMA/AAC (among other possible formats) players into a port provided in the gaming terminal in order to listen to their favorite music via the gaming terminal's overhead sound system.

[0014] According to another embodiment, the gaming terminal may further include interactive devices such as a joystick that may be integrated within the armrests of the gaming terminal's chair or alternatively, on a telescopic arm.

[0015] The gaming terminal may further include a television set integrated within the armrest of the chair or alternatively, on a telescopic arm.

[0016] The present gaming terminal may further include on-line access to casino services and/or generic Internet access. Generic Internet access may be independent from the casino services, but should be isolated so as not to interfere with casino's regulated software and security.

[0017] Also, embodiments of the present gaming terminal may further include means for allowing two or more players to seat conformably and play as a team.

[0018] Accordingly, one embodiment of the present invention is an integral gaming terminal for wagering on games, the integral gaming terminal being ergonomically configured to accommodate a seated player. The gaming terminal may include a frame; a first display fitted to the frame, the first display having at least one screen; a seat fitted to the frame; a payment accepting and/or dispensing device; a game wagering controller for controlling the wagering on the games; game interaction devices for enabling the player to interact with the games; a sound generator for generating sound, and means, coupled to the sound generator, for delivering sound to the player. The sound delivering means may be configured to deliver the sound close to the player's ears.

[0019] The sound delivering means may be fitted to the frame and/or to or above the seat, for example. The frame may be a generally U-shaped armature having a bottom end, a first top end and a second top end, the bottom end being configured to rest on or to be attached to a floor surface; the first display being fitted near the first top end, the seat being fitted near the second top end. The sound delivering means may be fitted to the frame near the second top end and above the seat. The integral gaming terminal may further comprise an integral armrest fitted to the frame and/or to the seat, for example. The payment accepting and/or dispensing device may be fitted to the frame and/or to the seat, and/or to the armrest, for example. The gaming terminal may further include a second display fitted to the frame and/or the seat, to enable the player to view predetermined TV channels or video streams. The seat may further include an armrest and the second display may be attached to the armrest. The sound generator may be configured to generate and the sound delivering means may be configured to deliver: audio feedback while gaming or navigating through gaming options; game operator messages or announcements; prerecorded sound or music selected by the player via an (a jukebox-like, for example) interface; audio streaming, and/or soothing sounds, for example. The sound generator may include means for active or passive sound cancellation to isolate the player from surrounding noise. The integral gaming terminal may also include means for isolating the player from surrounding light. Such means may include, for

example, an orientable opaque, semi-opaque or tinted panel, or a drop down filtering visor or goggles, for example, to isolate the player from surrounding light.

[0020] The ergonomic gaming terminal may also include ergonomic adjustment means coupled to the first display, the seat, the cash accepting and dispensing device, the game interaction devices and/or the sound delivering means, for example. The ergonomic adjustment means may include, for example, mechanical adjustment means, motorized adjustments means, tilt/rotation adjustments means, computer controlled adjustment means, remotely controlled adjustments means controllable via a joystick or a touch screen, and/or means for adjusting ergonomic parameters according to pre-stored user parameter profiles. The ergonomic adjustment means may include predetermined configuration settings to facilitate the player sitting in and standing up from the integral gaming terminal.

[0021] The game wagering controller may further include means for allowing the player secure access to PC functions according to a predetermined scheme. The predetermined scheme may include a gaming quota, pay per use, a promotion and/or a bonus, for example. The PC functions may include, for example, Internet browsing, email access, instant messaging, stock market, music playing, video playing, video conferencing and/or travel and entertainment bookings, to name a few of possible services that may be made available to the player.

[0022] The integral gaming terminal may include massaging mechanisms for massaging the player, such as mechanisms for massaging the player's back, mechanisms for massaging the player's arms, mechanisms for massaging the player's leg and/or foot, for example. The massaging mechanisms may include thumbing mechanisms, vibrating mechanisms, rolling mechanisms, kneading mechanisms, percussion mechanisms, and/or mechanisms for applying therapeutic compression, among other possibilities. The integral gaming terminal may also include an adjustable footrest fitted to one of the chair and the frame. The game interaction devices may include an adjustable console that may include at least one of play buttons and/or a joystick, for example.

[0023] The game wagering controller may be configured to communicate with a central computer system via a network and/or to communicate with other gaming terminals via a network. The integral gaming terminal may also include one or more communication device configured to enable instant personal communication with participating players on other gaming terminals. The communication device may be configured to implement, for example, text messaging, a personal contact list, voice communication, webcam communication and photo transfer and/or a personal calendar for organizing contact time and gaming events, among other possible services that may be made available to the player.

[0024] The sound generator may include audio input means to enable the sound delivering means to deliver audio from a personal audio player. The audio input means may be configured for wired and/or wireless operation. The integral gaming terminal may include a signal generator configured to generate a signal when a seated player has not placed a wager for a predetermined amount of time. The signal generator may be configured to send the generated signal to



a central computer system, send the generated signal to a floor manager of a casino, and/or communicate to the player to inform the player that services available on the gaming terminal are reserved for active players.

[0025] According to another embodiment thereof, the present invention is an integral gaming terminal for wagering on games, and is ergonomically configured to accommodate at least two seated participating players. Such a gaming terminal may include a frame; a first display fitted to the frame, the first display having at least one screen; a seat fitted to the frame for each of the at least two participating players or alternatively a double seat; a payment accepting and/or dispensing device; a game wagering controller for controlling wagering on the games, the game wagering controller being configured to operate as if the at least two seated participating players are one player; game interaction devices to enable the at least one player to interact with the games; a sound generator for generating sound, and means for delivering sound coupled to the sound generator.

[0026] Another embodiment of the present invention is a network of at least two gaming terminals for wagering on games, each of the at least two gaming terminals being ergonomically configured to accommodate at least one seated participating player. Each gaming terminal of the network of gaming terminals includes a frame; a first display fitted to the frame, the first display having at least one screen; a seat fitted to the frame for each of the at least two participating players; a payment accepting and/or dispensing device; a game wagering controller for controlling wagering on the games; a communication device configured to enable communication between the at least two gaming terminals, the communication device being configured for at least one of data, voice, and video communication; game interaction devices to enable interaction with the games; a sound generator for generating sound, and means, coupled to the sound generator, for delivering sound.

#### BRIEF DESCRIPTION OF THE DRAWINGS

[0027] FIG. 1 is a conceptual view of an integral gaming terminal according to an embodiment of the present invention.

[0028] FIG. 2 is a side view of the integral gaming terminal with player of FIG. 1.

[0029] FIG. 3 is a perspective view of the integral gaming terminal of FIG. 1.

[0030] FIG. 4 is another detailed view of the integral gaming terminal of FIG. 1.

[0031] FIG. 5 illustrates the articulated and motorized functionality of the screen and console of the integral gaming terminal of FIG. 1.

[0032] FIG. 6 illustrates the articulated/motorized functionality of the chair and overhead sound system of the integral gaming terminal of FIG. 1.

[0033] FIG. 7 illustrates additional articulated and/or motorized rotational functionality of the integral gaming terminal of FIG. 1.

[0034] FIG. 8A shows a view of the overhead sound system of the integral gaming terminal of FIG. 1.

[0035] FIG. 8B shows another view of the overhead sound system of the integral gaming terminal of FIG. 1.

[0036] FIG. 8C shows another view of the overhead sound system of the integral gaming terminal of FIG. 1.

[0037] FIG. 8D shows yet another view of the overhead sound system of the integral gaming terminal of FIG. 1.

[0038] FIG. 9 shows a perspective view of the integral gaming terminal of an embodiment of the present invention equipped with an armrest and television.

[0039] FIG. 10 is a perspective view of the integral gaming terminal of FIG. 9.

[0040] FIG. 11 is a rear view of the integral gaming terminal of FIG. 9.

[0041] FIG. 12 is a side view of the integral gaming terminal of FIG. 9.

[0042] FIG. 13 is a top view of the integral gaming terminal of FIG. 9.

[0043] FIG. 14 is a perspective view of an integral gaming terminal that is ergonomically configured to accommodate at least two seated participating players, according to another embodiment of the present invention.

#### DETAILED DESCRIPTION OF THE INVENTION

[0044] In the following detailed description of exemplary embodiments of the invention, reference is made to the accompanying drawings, which form a part hereof, and in which is shown by way of illustration specific exemplary embodiments in which the invention may be practiced. These embodiments are described in sufficient detail to enable those skilled in the art to practice the invention, and it is to be understood that other embodiments may be utilized and that logical, mechanical, electrical and other changes may be made without departing from the spirit or scope of the present invention. The following detailed description is, therefore, not to be taken in a limiting sense, and the scope of the present invention is defined only by the appended claims.

[0045] FIG. 1 at 100 illustrates aspects of an embodiment of the present invention in which the integral gaming terminal 102 accommodates a seated player 104 (the player forms no part of the present invention). A headset or overhead sound system 106 may surround at least a portion of the player's head. The overhead sound system may include means for generating and delivering sound or may include only means for delivering the sound, and the sound generating means may be disposed elsewhere within the integral gaming terminal. FIG. 2 shows side view 200 of the integral gaming terminal of FIG. 1.

[0046] FIG. 3 at 300 illustrates the various components of an embodiment of the integral gaming terminal 102 of the present invention. FIG. 4 shows a side view 400 of the gaming terminal 102. Considering now FIGS. 3 and 4 collectively, the embodiment of the integral gaming terminal 102 may include dual flat screen displays (LCD displays, for example) 302, a game interaction devices (including a buttons console 304, for example), cash or cash-less payment accepting and/or dispensing devices 306, a base 308, a front frame 310, a chair 312, an overhead sound system



**106** and a rear frame **312**. The front frame **310** may support the display **302** and the buttons console **304**, and may include a metal enclosure or an enclosure formed of light-weight composite material in a configuration that includes a central post-like frame such as shown in the illustrations. The rear frame **312** may support the chair(s) **312** and the overhead sound system **106**. The front frame and the rear frame may be attached to the base **308**, or alternatively may be attached (e.g., bolted) directly to the floor. The overhead sound system **106** may be attached directly to the rear frame **312**, or alternatively to the chair(s) **312** and/or the chair frame (not shown). A game wagering controller for controlling wagering on the games offered on the integrated gaming terminal may be disposed behind the display(s) **302** or inside the base **308**, for example. The game wagering controller may be coupled to the game interaction devices and to the payment accepting and/or dispensing devices.

[0047] **FIG. 5** at **500** illustrates various ergonomic adjustments on the front frame **310** that may be available to a player using a gaming terminal **102** according to an embodiment of the present invention. Such front frame adjustments enable the present gaming terminal **102** to be adjusted by the player to achieve the most comfortable playing position. The display(s) **302** may be adjusted up and down as indicated at **506** as well as tilted backward and forward as suggested at **508**. The buttons console **304** may be adjusted up and down as shown at **514** as well as tilted upward and downward as indicated at **512**. The front frame **310** may be tilted backward and forward, as shown at **516**.

[0048] **FIG. 6** at **600** illustrates the various ergonomic adjustments of the components of the gaming terminal that may be fixed on the rear frame **316**. Adjusting these components enables the player to achieve a comfortable playing position. The chair **312** may be adjusted up and down as shown at **604** as well as tilted backward and forward as indicated at reference numeral **608**. The overhead sound system **106** may be also be adjusted up and down as shown at **618** as well as tilted upward and downward as shown at **616**. The rear frame **316** may be moved backward and forward on the base **308**, as indicated at **612**.

[0049] **FIG. 7** at **700** illustrates additional ergonomic adjustments that may be carried out on the gaming terminal **102**. Such adjustments may include swiveling **704** of the monitor **302** (or the front frame **306**), and/or swiveling of the rear frame **310**, as shown at **712**.

[0050] The adjustments detailed above may be made manually via hand-locking mechanisms or electrically via motorized mechanisms. Motorized mechanisms may be activated via switches and joysticks (such as for adjusting car exterior mirrors) or via the touch screen. According to an embodiment of the invention, all or some of the above-described adjustments may be memorized together with the player profile (when a player card is used for example, whereby personal parameters related to the player identity, activity and habits are recorded in a central server or a smart card), so the player may recall personalized ergonomic adjustments each time he or she plays on a similar gaming terminal. Embodiments of the present gaming terminal are not limited to the adjustments described above and shown in the drawings, as other ergonomic adjustments may be provided. Any motorized and/or memorized gaming terminal ergonomic adjustments is thus considered to be within the scope of the present inventions.

[0051] According to an embodiment of the invention, the motorized adjustments may have a special setting that facilitates entry and exit of the player into and out of the seated position, including putting away the overhead sound system.

[0052] As noted above, embodiments of the present invention may include integrated relaxation mechanisms such as back massage devices integrated in the seat, leg/foot massage devices so that the player may enjoy body relaxing while playing. Such massaging mechanisms may include, for example, means for thumbing, vibrations, rolling, kneading, percussion, therapeutic compression or a combination thereof.

[0053] **FIGS. 8A, 8B, 8C** and **8D** at **800** show various views of an embodiment of the overhead sound system **106** wherein digital quality speakers **804** are integrated in a shell **802**. The shell **802** may be made of composite materials such as used for example for the fabrication of motorcycle helmets. The overhead sound system **106** may include an articulated mount **812** point for attachment to the rear frame **310**.

[0054] According to an embodiment of the present invention, the overhead sound system **106** may include active or passive noise-canceling or noise attenuation electronics to eliminate or attenuate ambient noise. The player may listen to the sounds generated by the game as well as selected songs or soothing music, all the while being substantially isolated from surrounding noise. The songs and music may be made available by the casino operator via a jukebox screen selection, or alternatively, the player may plug his personal MP3/WMA/AAC (among other possible formats) compatible portable player to an wired or wireless input line of the gaming terminal **102** in order to listen to his or her favorite music via the overhead sound system **106** while playing. The present integrated gaming terminal may also include devices for isolating the player from surrounding and parasitic light. Such devices may include, for example, one or more opaque or tinted panels or a drop down filtering visor or goggles. Such light isolation devices may be fitted or integrated into the overhead sound system.

[0055] Personal preference settings such as sound level, sound environmental rendering (studio effect, hall effect, cathedral effect, etc.), and/or music type (for example) may be memorized together with player profile.

[0056] **FIGS. 9, 10, 11** and **12** at show various views of another embodiment of the present gaming terminal referenced at numeral **902**. The gaming terminal **902** further includes an integral armrest **904** that may be fitted, for example, to the rear frame **1004** and that may include information and user interaction devices such as a joystick (no shown) and/or a small size display monitor, as shown at **906**. Buttons and controls for the small size display monitor **906** are shown at **1108** in **FIG. 11**. **FIG. 13** at **1300** is a top view of the gaming terminal of **FIGS. 9-12**, fitted with an armrest **904** fixed directly to the gaming machine rear frame **1004**. A footrest may also be provided. The small size display monitor is shown at numeral **906**. The integral armrest **904** may further comprise control buttons **1108** to adjust, for example, the information displayed on the small size display monitor **906**. The integrated arm rests **904** may further include control buttons **1310** for interacting with the game in a more relaxed position with the arm resting on the



armrest **904**, a joystick **1312**, trackball or mouse for precision interaction with the game or information selection on the main front monitor **302** (large size monitor mounted on the front frame) such as when browsing Internet pages.

[0057] According to an embodiment of the invention, the button console including the control buttons **1310**, joystick **1312** and/or other controls may be fitted on a telescoping arm or a deployable arm (not shown) mounted on the integrated armrest **904** such that the play buttons and/or joystick/mouse may be adjusted to the player's favorite ergonomic position. The telescoping arm or a deployable arm may be motorized and memorized together with the player profile.

[0058] The gaming terminal may further comprise on-line access to casino services or generic Internet access. Generic Internet access may be independent from the casino services, but should securely isolated such as not to interfere with casino regulated software and security.

[0059] According to another embodiment depicted in FIG. 14, the gaming terminal may be configured as a two-seater allowing two players to seat conformably as well as play buttons to allow the players to play as a team or as a couple. Two seats **1302**, **1304** may be provided. Alternatively, a bench suitable for two players may be fitted to the integral gaming terminal's frame. The overhead sound system may be enlarged to accommodate the head of the two players, or alternatively each player may have an individual overhead sound system, which is the embodiment shown in FIG. 13. The gaming machine may comprise one or two sets of play buttons whereby the gaming terminal software may select the player to play in accordance with a predetermined logic such as first one to press, each player in turn, or at random. The play buttons may be configured such that the two players are considered to be a single player. The embodiment of FIG. 14 may be extended to more than two players. The gaming terminal may accept payments (cash or cash-less) and/or deliver payments and display (cash or cash-less) of winnings/bonus (if any) for the team or for each player. This two-seater embodiment may also support the generation of downloadable games.

[0060] In an alternative embodiment, two (or more) individual gaming terminals may be networked together (distance between the terminals not being a factor) such as to act as a single gaming machine in which one of the gaming terminal is selected as the master gaming machine and the other(s) gaming machines is/are slaved to the master gaming machine. In that case, the credit balance and the game outcome are common to all ganged gaming terminals. The gaming software of the participating networked terminals may be configured to provide the same features as described above. In addition, each individual gaming terminal may comprise voice and/or video communication (such as a webcam) to enable direct communication between the team members.

[0061] Indeed, in order to maximize revenue, such multi-player arrangement in which several gaming terminals act as a single gaming machine may be reserved for high-stake players or to boost play at times of low casino activity.

[0062] According to another alternative embodiment, team players may elect to play completely individually each on a separate gaming terminal machine (terminals are con-

figured for conventional gaming), but elect to join with other team members in such a way that the play selection and performance of others may be seen by all on their screen, as a video insert for example. In this manner, players may be stimulated by the good performance of the bigger winners and try to catch-up by persevering in continuing to play. The gaming software of the participating terminals is configured to provide the features described.

[0063] The described and illustrated embodiments set out ergonomically adjustable "integral" gaming terminals configured to comfortably surround the player and provide audio isolation from the surroundings as well as dispense favorite music, secure access to the Internet, access to news information, communicate with others, play against others, play as a team and provide body relaxing. Some entertainment, relaxing and information services may be activated for an additional fee, if a bonus or quota is attained or according to a promotional scheme. If the player stops playing for an extended predetermined period of time, a warning signal may be generated and communicated to the player and/or to the casino's floor manager, for example.

[0064] Embodiments of the invention may accommodate two (or more) seated players to allow the players to play comfortably as a couple or team for extended periods.

[0065] As computer controllers integrated in gaming terminals are rapidly adopting the generic PC architecture and windowing software such as Microsoft windows and Linux (embedded or not-embedded) and that payment is rapidly shifting to cashless, the cost of gaming machines hardware is declining. The present inventions provide attractive means to differentiate gaming terminals for the competition and consequently prevent or avoid erosion of profit margins.

What is claimed is:

1. An integral gaming terminal for wagering on games, the integral gaming terminal being ergonomically configured to accommodate a seated player and comprising:

- a frame;
- a first display fitted to the frame, the first display having at least one screen;
- a seat fitted to the frame;
- a payment accepting and/or dispensing device;
- a game wagering controller for controlling the wagering on the games;
- game interaction devices for enabling the player to interact with the games;
- a sound generator for generating sound, and
- means, coupled to the sound generator, for delivering sound to the player close to the seated player's ears.

2. The integral gaming terminal of claim 1, wherein the sound delivering means is fitted to the frame.

3. The integral gaming terminal of claim 1, wherein the sound delivering means is fitted to the seat.

4. The integral gaming terminal of claim 3, wherein the sound delivering means is fitted above the seat.

5. The integral gaming terminal of claim 1, wherein the frame is a generally U-shaped armature having a bottom end, a first top end and a second top end, the bottom end being configured to rest on or to be attached to a floor



surface; the first display being fitted near the first top end, the seat being fitted near the second top end.

6. The integral gaming terminal of claim 5, wherein the sound delivering means is fitted to the frame near the second top end and above the seat.

7. The integral gaming terminal of claim 1, further comprising an integral armrest fitted to the frame.

8. The integral gaming terminal of claim 1, further comprising an integral armrest fitted to the seat.

9. The integral gaming terminal of claim 1, wherein the payment accepting and/or dispensing device is fitted to the frame.

10. The integral gaming terminal of claim 1, wherein the payment accepting and/or dispensing device is fitted to the seat.

11. The integral gaming terminal of claim 1, further comprising a second display fitted to one of the frame and the seat, the second display enabling the player to view predetermined TV channels or video streams.

12. The integral gaming terminal of claim 11, wherein the seat further comprises an armrest and the second display is attached to the armrest.

13. The integral gaming terminal of claim 1, wherein the sound generator is configured to generate and the sound delivering means is configured to deliver at least one of:

audio feedback while gaming or navigating through gaming options;

game operator messages or announcements;

prerecorded sound or music selected by the player via an interface;

audio streaming, and

soothing sounds.

14. The integral gaming terminal of claim 1, wherein the sound generator includes means for active sound cancellation to isolate the player from surrounding noise.

15. The integral gaming terminal of claim 1, wherein the sound generator includes means for passive noise cancellation to isolate the player from surrounding noise.

16. The integral gaming terminal of claim 1, further including means for isolating the player from surrounding light.

17. The integral gaming terminal of claim 16, wherein the light isolating means includes one of:

an orientable opaque or tinted panel, and

a drop down filtering visor or goggles to isolate the player from surrounding light.

18. The integral gaming terminal of claim 1, further comprising ergonomic adjustment means coupled to at least one of: the first display, the seat, the cash accepting and dispensing device, the game interaction devices and the sound delivering means.

19. The integral gaming terminal of claim 18, wherein the ergonomic adjustment means includes at least one of mechanical adjustment means, motorized adjustments means, tilt/rotation adjustments means, computer controlled adjustment means, remotely controlled adjustments means controllable via a joystick or a touch screen, and means for adjusting ergonomic parameters according to pre-stored user parameter profiles.

20. The integral gaming terminal of claim 18, wherein the ergonomic adjustment means includes predetermined con-

figuration settings to facilitate the player sitting in and standing up from the integral gaming terminal.

21. The integral gaming terminal of claim 1, wherein the game wagering controller further comprise means for allowing the player secure access to PC functions according to a predetermined scheme.

22. The integral gaming terminal of claim 21, wherein the predetermined scheme includes at least one of a gaming quota, pay per use, a promotion and a bonus.

23. The integral gaming terminal of claim 21, wherein the PC functions include at least one of Internet browsing, email access, instant messaging, stock market, music playing, video playing, video conferencing and travel and entertainment bookings.

24. The integral gaming terminal of claim 1, further comprising massaging means for massaging the player.

25. The integral gaming terminal of claim 24, wherein the massaging means includes at least one of means for massaging the player's back, means for massaging the player's arms, means for massaging the player's leg and/or foot.

26. The integral gaming terminal of claim 24, wherein the massaging means includes at least one of thumbing means, vibrating means, rolling means, kneading means, percussion means, and means for applying therapeutic compression.

27. The integral gaming terminal of claim 1, further comprising an adjustable footrest fitted to one of the chair and the frame.

28. The integral gaming terminal of claim 1, wherein the game interaction devices include an adjustable console that includes at least one of play buttons and a joystick.

29. The integral gaming terminal of claim 1, wherein the game wagering controller is configured to communicate with a central computer system via a network.

30. The integral gaming terminal of claim 1, wherein the game wagering controller is configured to communicate with other gaming terminals via a network.

31. The integral gaming terminal of claim 1, further comprising a communication device configured to enable instant personal communication with participating players on other gaming terminals.

32. The integral gaming terminal of claim 31, wherein the communication device is configured to implement at least one of text messaging, a personal contact list, voice communication, webcam communication and photo transfer and a personal calendar for organizing contact time and gaming events.

33. The integral gaming terminal of claim 1, wherein the sound generator includes audio input means to enable the sound delivering means to deliver audio from a personal audio player.

34. The integral gaming terminal of claim 33, wherein the audio input means is configured for wireless operation.

35. The integral gaming terminal of claim 33, wherein the audio input means is configured for wired operation.

36. The integral gaming terminal of claim 1, further including a signal generator configured to generate a signal when a seated player has not placed a wager for a predetermined amount of time.

37. The integral gaming terminal of claim 36, wherein the signal generator is configured to at least one of send the generated signal to a central computer system, send the generated signal to a floor manager of a casino, and com-



municate to the player to inform the player that services available on the gaming terminal are reserved for active players.

**38.** An integral gaming terminal for wagering on games, the integral gaming terminal being ergonomically configured to accommodate at least two seated participating players and comprising:

- a frame;
- a first display fitted to the frame, the first display having at least one screen;
- a seat fitted to the frame for each of the at least two participating players;
- a payment accepting and/or dispensing device;
- a game wagering controller for controlling wagering on the games, the game wagering controller being configured to operate as if the at least two seated participating players are one player;
- game interaction devices to enable the at least one player to interact with the games;
- a sound generator for generating sound, and
- means for delivering sound coupled to the sound generator, the sound delivering means being disposed substantially close to at least one of the two seated participating player's ears.

**39.** The integral gaming terminal of claim 38, wherein the game interaction devices include a bet button for placing a bet, and wherein the game interaction devices are configured to enable the at least two participating players to press the bet button according to one of a plurality of pre-selected modes.

**40.** The integral gaming terminal of claim 39, wherein the plurality of pre-selected modes includes a first to press mode, a turn taking mode and a random mode in which the next player allowed to activate the bet button is randomly selected.

**41.** The integral gaming terminal of claim 38, wherein the game interaction devices and the game wagering controller are configured to identify each of the at least two participating player symbolically or by name and to track and display a game performance of each of the at least two participating players.

**42.** The integral gaming terminal of claim of claim 38, wherein the sound delivering means is fitted to the frame.

**43.** The integral gaming terminal of claim 38, wherein the sound delivering means is fitted to each seat.

**44.** The integral gaming terminal of claim 43, wherein the sound delivering means is fitted above each seat.

**45.** The integral gaming terminal of claim 38, wherein the frame is a generally U-shaped armature having a bottom end, a first top end and a second top end, the bottom end being configured to rest on or to be attached to a floor surface; the first display being fitted near the first top end, the seat being fitted near the second top end.

**46.** The integral gaming terminal of claim 45, wherein the sound delivering means is fitted to the frame near the second top end and above the seat.

**47.** The integral gaming terminal of claim 38, further comprising at least one integral armrest fitted to the frame or fitted to each seat.

**48.** The integral gaming terminal of claim 38, wherein the payment accepting and/or dispensing device is fitted to the frame.

**49.** The integral gaming terminal of claim 38, wherein the payment accepting and/or dispensing device is fitted to one of the seats.

**50.** The integral gaming terminal of claim 38, further comprising a second display fitted to one of the frame and one of the seats, the second display enabling each of the at least two participating players to view predetermined TV channels or video streams.

**51.** The integral gaming terminal of claim 50, wherein at least one of the seats further comprises an armrest and wherein the second display is attached to the armrest.

**52.** The integral gaming terminal of claim 38, wherein the sound generator is configured to generate and the sound delivering means is configured to deliver at least one of:

- audio feedback while gaming or navigating through gaming options;
- game operator messages or announcements;
- prerecorded sound or music selected by the player via an interface;
- audio streaming, and
- soothing sounds.

**53.** The integral gaming terminal of claim 38, wherein the sound generator includes means for active sound cancellation to isolate the player from surrounding noise.

**54.** The integral gaming terminal of claim 38, wherein the sound generator includes means for passive noise cancellation to isolate the player from surrounding noise.

**55.** The integral gaming terminal of claim 38, further including means for isolating the player from surrounding light.

**56.** The integral gaming terminal of claim 55, wherein the isolating means includes one of:

- an orientable opaque or tinted panel, and
- a drop down filtering visor or goggles.

**57.** The integral gaming terminal of claim 38, further comprising ergonomic adjustment means coupled to at least one of: the first display, the seat, the cash accepting and dispensing device, the game interaction devices and the sound delivering means.

**58.** The integral gaming terminal of claim 57, wherein the ergonomic adjustment means includes at least one of mechanical adjustment means, motorized adjustments means, tilt/rotation adjustments means, computer controlled adjustment means, remotely controlled adjustments means controllable via a joystick or a touch screen, and means for adjusting ergonomic parameters according to pre-stored user parameter profiles.

**59.** The integral gaming terminal of claim 57, wherein the ergonomic adjustment means includes predetermined configuration settings to facilitate the player sitting in and standing up from the integral gaming terminal.

**60.** The integral gaming terminal of claim 38, wherein the game wagering controller further comprise means for allowing the player secure access to PC functions according to a predetermined scheme.

**61.** The integral gaming terminal of claim 60, wherein the predetermined scheme includes at least one of a gaming quota, pay per use, a promotion and a bonus.



62. The integral gaming terminal of claim 60, wherein the PC functions include at least one of Internet browsing, email access, instant messaging, stock market, music playing, video playing, video conferencing and travel & entertainment bookings.

63. The integral gaming terminal of claim 38, further comprising massaging means for massaging the player.

64. The integral gaming terminal of claim 63, wherein the massaging means includes at least one of means for massaging the player's back, means for massaging the player's arms, means for massaging the player's leg and/or foot.

65. The integral gaming terminal of claim 63, wherein the massaging means includes at least one of thumbing means, vibrating means, rolling means, kneading means, percussion means, and means for applying therapeutic compression.

66. The integral gaming terminal of claim 38, further comprising an adjustable footrest configured to be fitted to one of each chair and the frame.

67. The integral gaming terminal of claim 38, wherein the game interaction devices include an adjustable console that includes at least one of play buttons and a joystick.

68. The integral gaming terminal of claim 38, wherein the game wagering controller is configured to communicate with a central computer system via a network.

69. The integral gaming terminal of claim 38, wherein the game wagering controller is configured to communicate with other gaming terminals via a network.

70. The integral gaming terminal of claim 38, further comprising a communication device configured to enable instant personal communication with participating players on other gaming terminals.

71. The integral gaming terminal of claim 70, wherein the communication device is configured to implement at least one of text messaging, a personal contact list, voice communication, webcam communication and photo transfer and a personal calendar for organizing contact time and gaming events.

72. The integral gaming terminal of claim 38, wherein the sound generator includes audio input means to enable the sound delivering means to deliver audio from a personal audio player.

73. The integral gaming terminal of claim 72, wherein the audio input means is configured for wireless operation.

74. The integral gaming terminal of claim 72, wherein the audio input means is configured for wired operation.

75. The integral gaming terminal of claim 38, further including a signal generator configured to generate a signal when a seated player has not placed a wager for a predetermined amount of time.

76. The integral gaming terminal of claim 75, wherein the signal generator is configured to at least one of send the generated signal to a central computer system, send the generated signal to a floor manager of a casino, and communicate to the player to inform the player that services available on the gaming terminal are reserved for active players.

77. An integral gaming terminal for wagering on games, the integral gaming terminal being ergonomically configured to accommodate at least two seated participating players and comprising:

a frame;

a first display fitted to the frame, the first display having at least one screen;

a seat fitted to the frame for each of the at least two participating players;

a payment accepting and/or dispensing device;

a game wagering controller for controlling wagering on the games, the game wagering controller being configured to operate as if the at least two seated participating players are one player;

game interaction devices to enable the at least one player to interact with the games;

a sound generator for generating sound, and

means for delivering sound coupled to the sound generator.

78. A network of at least two gaming terminals for wagering on games, each of the at least two gaming terminals being ergonomically configured to accommodate at least one seated participating player, and each gaming terminal comprising:

a frame;

a first display fitted to the frame, the first display having at least one screen;

a seat fitted to the frame for each of the at least two participating players;

a payment accepting and/or dispensing device;

a game wagering controller for controlling wagering on the games;

a communication device configured to enable communication between the at least two gaming terminals, the communication device being configured for at least one of data, voice, and video communication;

game interaction devices to enable interaction with the games;

a sound generator for generating sound, and

means, coupled to the sound generator, for delivering sound, the sound delivering means being disposed substantially close to at least one of the participating player's ears.

79. The integral gaming terminal of claim 78, wherein the game interaction devices and the game wagering controller are configured to allow all of the participating players playing at each of the at least two gaming terminals to be considered a unique player.

80. The integral gaming terminal of claim 78, wherein the game interaction devices includes a bet button for placing a bet, and wherein the game interacting devices are configured to enable the at least two participating players to press the bet button according to one of a plurality of pre-selected modes.

81. The integral gaming terminal of claim 80, wherein the plurality of pre-selected modes including a first to press mode, a turn taking mode and a random mode in which the next player to be allowed to activate the bet button is randomly selected.

82. The integral gaming terminal of claim 81 wherein the game interaction devices and the game wagering controller are configured to identify each of the at least two partici-



pating player symbolically or by name and to track and display a game performance of each of the at least two participating players.

**83.** The integral gaming terminal of claim 78, wherein the sound delivering means is fitted to the frame.

**84.** The integral gaming terminal of claim 78, wherein the sound delivering means is fitted to the seat.

**85.** The integral gaming terminal of claim 84, wherein the sound delivering means is fitted above the seat.

**86.** The integral gaming terminal of claim 78, wherein the frame is a generally U-shaped armature having a bottom end, a first top end and a second top end, the bottom end being configured to rest on or to be attached to a floor surface; the first display being fitted near the first top end, the seat being fitted near the second top end.

**87.** The integral gaming terminal of claim 86, wherein the sound delivering means is fitted to the frame near the second top end and above the seat.

**88.** The integral gaming terminal of claim 78, further comprising an integral armrest fitted to the frame or to the seat.

**81.** The integral gaming terminal of claim 80, wherein the plurality of pre-selected modes including a first to press mode, a turn taking mode and a random mode in which the next player to be allowed to activate the bet button is randomly selected.

**82.** The integral gaming terminal of claim 81 wherein the game interaction devices and the game wagering controller are configured to identify each of the at least two participating player symbolically or by name and to track and display a game performance of each of the at least two participating players.

**83.** The integral gaming terminal of claim 78, wherein the sound delivering means is fitted to the frame.

**84.** The integral gaming terminal of claim 78, wherein the sound delivering means is fitted to the seat.

**85.** The integral gaming terminal of claim 84, wherein the sound delivering means is fitted above the seat.

**86.** The integral gaming terminal of claim 78, wherein the frame is a generally U-shaped armature having a bottom end, a first top end and a second top end, the bottom end being configured to rest on or to be attached to a floor surface; the first display being fitted near the first top end, the seat being fitted near the second top end.

**87.** The integral gaming terminal of claim 86, wherein the sound delivering means is fitted to the frame near the second top end and above the seat.

**88.** The integral gaming terminal of claim 78, further comprising an integral armrest fitted to the frame or to the seat.

**89.** The integral gaming terminal of claim 78, wherein the payment accepting and/or dispensing device is fitted to the frame.

**90.** The integral gaming terminal of claim 78, wherein the payment accepting and/or dispensing device is fitted to the seat.

**91.** The integral gaming terminal of claim 78, further comprising a second display fitted to one of the frame and the seat, the second display enabling the player to view predetermined TV channels or video streams.

**92.** The integral gaming terminal of claim 91, wherein the seat further comprises an armrest and the second display is attached to the armrest.

**93.** The integral gaming terminal of claim 78, wherein the sound generator is configured to deliver at least one of:

audio feedback while gaming or navigating through gaming options;

game operator messages or announcements;

prerecorded sound or music selected by the player via an interface;

audio streaming, and

soothing sounds.

**94.** The integral gaming terminal of claim 78, wherein the sound generator includes active sound cancellation means for isolating the player from surrounding noise.

**95.** The integral gaming terminal of claim 78, wherein the sound generator includes passive sound cancellation means for isolating the player from surrounding noise.

**96.** The integral gaming terminal of claim 78, further comprising means for isolating the player from surrounding light.

**97.** The integral gaming terminal of claim 96, wherein the light isolating means includes one of:

an orientable opaque or tinted panel, and

a drop down filtering visor or goggles.

**98.** The integral gaming terminal of claim 78, further comprising ergonomic adjustment means coupled to at least one of: the first display, the seat, the cash accepting and dispensing device, the game interaction devices and the sound delivering means.

**99.** The integral gaming terminal of claim 98, wherein the ergonomic adjustment means includes at least one of mechanical adjustment means, motorized adjustments means, tilt/rotation adjustments means, computer controlled adjustment means, remotely controlled adjustments means controllable via a joystick or a touch screen, and means for adjusting ergonomic parameters according to pre-stored user parameter profiles.

**100.** The integral gaming terminal of claim 98, wherein the ergonomic adjustment means includes predetermined configuration settings to facilitate the player sitting in and standing up from the integral gaming terminal.

**101.** The integral gaming terminal of claim 78, wherein the game wagering controller further comprise means for allowing the player secure access to PC functions according to a predetermined scheme.

**102.** The integral gaming terminal of claim 101, wherein the predetermined scheme includes at least one of a gaming quota, pay per use, a promotion and a bonus.

**103.** The integral gaming terminal of claim 101, wherein the PC functions include at least one of Internet browsing, email access, instant messaging, stock market, music playing, video playing, video conferencing and travel & entertainment bookings.

**104.** The integral gaming terminal of claim 78, further comprising massaging means for massaging the player.

**105.** The integral gaming terminal of claim 104, wherein the massaging means includes at least one of means for massaging the player's back, means for massaging the player's arms, means for massaging the player's leg and/or foot.

**106.** The integral gaming terminal of claim 104, wherein the massaging means includes at least one of thumbing



means, vibrating means, rolling means, kneading means, percussion means, and means for applying therapeutic compression.

**107.** The integral gaming terminal of claim 78, further comprising an adjustable footrest fitted to the chair or to the frame.

**108.** The integral gaming terminal of claim 78, wherein the game interaction devices include an adjustable console that includes at least one of play buttons and a joystick.

**109.** The integral gaming terminal of claim 78, wherein the game wagering controller is configured to communicate with a central computer system via a network.

**110.** The integral gaming terminal of claim 78, wherein the game wagering controller is configured to communicate with other gaming terminals via a network.

**111.** The integral gaming terminal of claim 78, wherein the communication device is configured to implement at least one of text messaging, a personal contact list, voice communication, webcam communication and photo transfer and a personal calendar for organizing contact time and gaming events.

**112.** The integral gaming terminal of claim 78, wherein the sound generator includes audio input means to enable the sound delivering means to deliver audio from a personal audio player.

**113.** The integral gaming terminal of claim 112 wherein the audio input means is configured for wireless operation.

**114.** The integral gaming terminal of claim 112, wherein the audio input means is configured for wired operation.

**115.** The integral gaming terminal of claim 78, further including a signal generator configured to generate a signal when a seated player has not placed a wager for a predetermined amount of time.

**116.** The integral gaming terminal of claim 115, wherein the signal generator is configured to at least one of send the

generated signal to a central computer system, send the generated signal to a floor manager of a casino, and communicate to the player to inform the player that services available on the gaming terminal are reserved for active players.

**117.** A network of at least two gaming terminals for wagering on games, each of the at least two gaming terminals being ergonomically configured to accommodate at least one seated participating player, and each gaming terminal comprising:

- a frame;
- a first display fitted to the frame, the first display having at least one screen;
- a seat fitted to the frame for each of the at least two participating players;
- a payment accepting and/or dispensing device;
- a game wagering controller for controlling wagering on the games;
- a communication device configured to enable communication between the at least two gaming terminals, the communication device being configured for at least one of data, voice, and video communication;
- game interaction devices to enable interaction with the games;
- a sound generator for generating sound, and
- means, coupled to the sound generator, for delivering sound.

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