respect to the dial **270** by rotating the dial **270** through a rotational action or gesture with respect to the touch screen **272** at the position of the dial **270**. **FIG. 2E** illustrates the position indicator **274** at an upward position, and **FIG. 2F** illustrates the position indicator **274** at a side position. Hence, the user can rotate the dial **270**, through a rotational action or gesture with respect to the touch screen **272**, such that the position indicator **274** moves from the upward position to the side position. **FIG. 2G** illustrates a portion of an overlay **276** having a dial guide **278** aligned over the dial **270**. The dial guide **278** assists a user with interacting with the dial **270** by maintaining alignment with respect to the dial **270**. Hence, the user can manipulate the dial **270** (e.g., a rotational action or gesture) without having to visually coordinate one's finger or stylus position over the dial **270**.

[**0046**] **FIG. 3A** is a flow diagram of a mixing console process **300** according to one embodiment of the invention. The mixing console process **300** is, for example, performed by the computing device **100** illustrated in **FIG. 1** or the computing device **202** illustrated in **FIG. 2A**.

[**0047**] The mixing console process **300** initially displays **302** a mixing console Graphical User Interface (GUI) on a touch screen of a computing device. For example, in **FIG. 1**, various media mixing controls associated with a mixing console GUI are displayed on the touch screen **104** of the computing device **100**. In one embodiment, a user can configure (e.g., move, arrange, or re-arrange) the various media mixing controls on the mixing console GUI. For example, the configuration adjustments can change the number of particular media mixing controls and their position with respect to the mixing console GUI.

[**0048**] After the mixing console GUI is displayed **302**, a decision **304** determines whether one or more touch inputs have been detected. When the decision **304** determines that no touch inputs have been detected, the mixing console process **300** awaits such input.

[**0049**] Once the decision **304** determines that one or more touch inputs have been detected, the mixing console process **300** continues. Namely, the GUI object or objects associated with the one or more touch inputs are identified **306**. Then, modifications to the identified GUI objects are determined **308** based on the touch inputs. Then, the identified GUI objects of the mixing console GUI are updated **310** to reflect the modifications. In addition, input data is determined **312** based on the touch inputs and the identified GUI objects. The operations **306-312** are rapidly performed at approximately the same time such that once a touch input is detected, the mixing console process **300** is able to not only determine **312** the input data but also update **310** the identified GUI objects being modified. Hence, the user is given the impression that the system is responsive to their input in an essentially real time manner.

[**0050**] It should also be noted that after the input data has been determined **312**, the mixing console process **300** returns to repeat the decision **304** and subsequent blocks so that additional touch inputs can be similarly processed. However, it should be noted that once the input data has been determined **312**, the computing device will operate to process the input data. For example, the input data might indicate that the rotation of a dial by the user is to cause the output volume on a given channel to be increased by 10%.

[**0051**] **FIG. 3B** is a flow diagram of a keyboard process **300** according to one embodiment of the invention. The keyboard process **300** is, for example, performed by the computing device **100** illustrated in **FIG. 1** or the computing device **202** illustrated in **FIG. 2A**.

[**0052**] The keyboard process **300** initially displays **352** a keyboard graphical user interface (GUI) on a touch screen of a computing device. For example, the touch screen **104** of the computing device **100** can display a virtual keyboard having a plurality of keys, instead of the various media mixing controls associated with a mixing console GUI as shown in **FIG. 1**. After the keyboard GUI is displayed **352**, a decision **354** determines whether one or more touch inputs have been detected. When the decision **354** determines that no touch inputs have been detected, the keyboard process **350** awaits such input.

[**0053**] Once the decision **354** determines that one or more touch inputs have been detected, the keyboard process **350** continues. Namely, the one or more keys associated with the one or more touch inputs are identified **356**. Then, modifications to the identified keys are determined **358** based on the touch inputs. Then, the identified keys of the keyboard GUI are updated **360** to reflect the modifications. In addition, input data is determined **362** based on the touch inputs and the identified keys. The operations **356-362** are rapidly performed at approximately the same time such that once a touch input is detected, the keyboard process **350** is able to not only determine **362** the input data but also update **360** the identified keys being modified. Hence, the user is given the impression that the system is responsive to their input in an essentially real time manner.

[**0054**] It should also be noted that after the input data has been determined **362**, the keyboard process **350** returns to repeat the decision **354** and subsequent blocks so that additional touch inputs can be similarly processed. However, it should be noted that once the input data has been determined **362**, the computing device will operate to process the input data. For example, the input data might indicate that a user has interacted with the keyboard GUI to play a chord and thus cause the computing device **100** to recognize such and perhaps output an audio sound pertaining to the chord.

[**0055**] In one embodiment, the input data being determined **362** can indicate which of the keys of the virtual keyboard are selected (e.g., pressed) by the user. Optionally, the input data can further indicate characteristics of the one or more touch inputs associated with the selection of such keys. For example, the characteristics can pertain to pressure and velocity. These characteristics can be used to characterize the one or more touch inputs, such as "hard" or "soft," for example. These characteristics can then in turn affect the audio sound being output be the computing device **100**. In one embodiment, for a touch screen, pressure and velocity can be monitored through examination area and timing of touch inputs. For additional details, see U.S. patent application Ser. No. 10/840,862, which has been incorporated herein by reference; and U.S. patent application Ser. No. 10/654,108, which has been incorporated herein by reference.

[**0056**] In another embodiment, the virtual keyboard can also make use of surface guides to assist the user. Surface guides were discussed above with respect to a mixing console but can also assist users of virtual keyboards in understanding the position of the keys without having to look at the keyboard GUI.