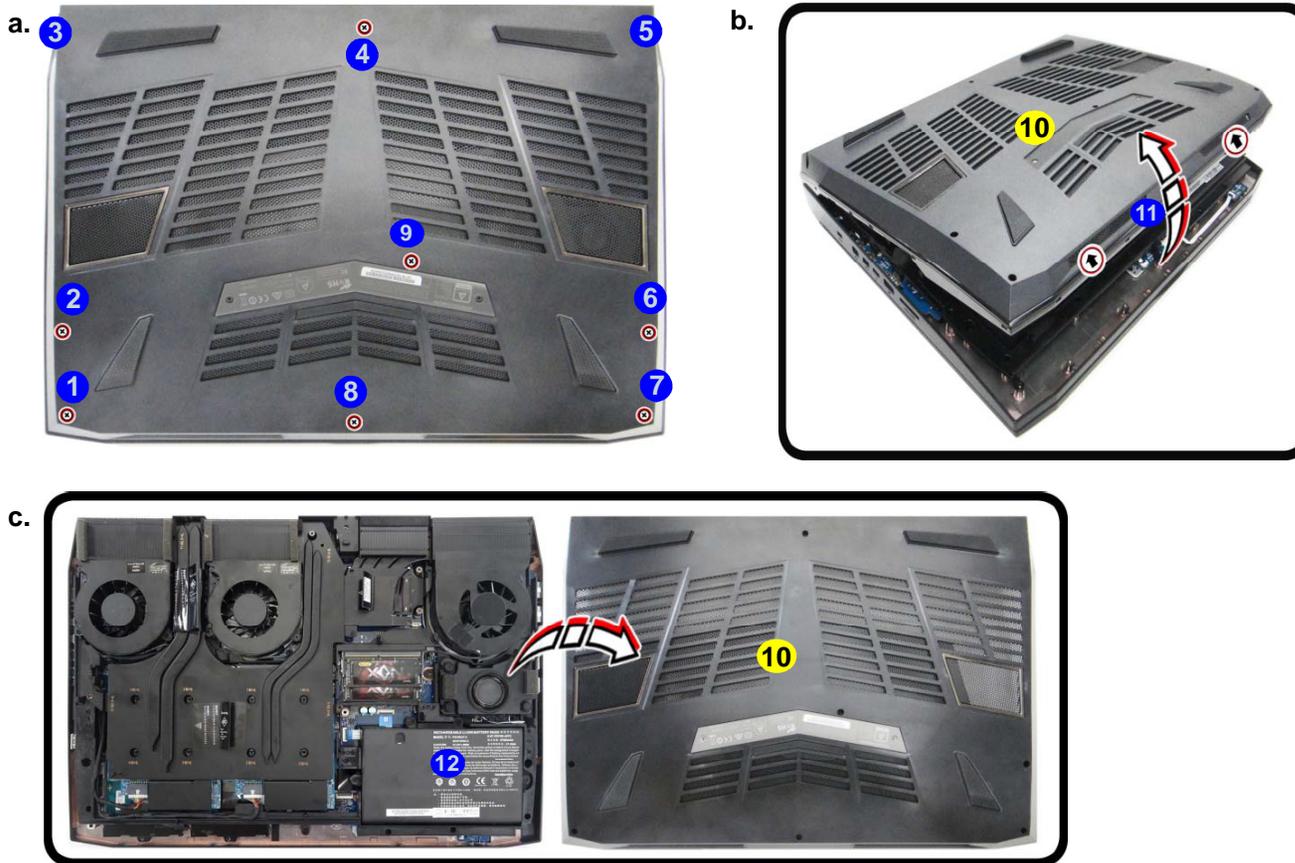


Removing the Battery

1. Turn the computer **off**, and turn it over.
2. Remove the screws **1** - **9** (*Figure 1a*).
3. Carefully lift the bottom case **10** up in the direction of the arrow **11** and remove it (*Figure 1b*).
4. The battery will be visible at point **12** on the computer (*Figure 1c*).

Figure 1
Battery Removal

- a. Remove the screws.
- b. Remove the bottom case.
- c. Locate the battery.




Powering the Computer On
After every disassembly, make sure that the bottom case's screws are all inserted and tightened before opening the Lid/LCD and turning the computer on.

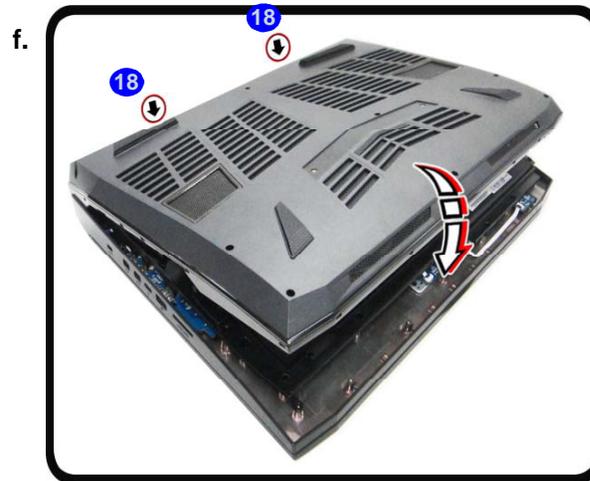
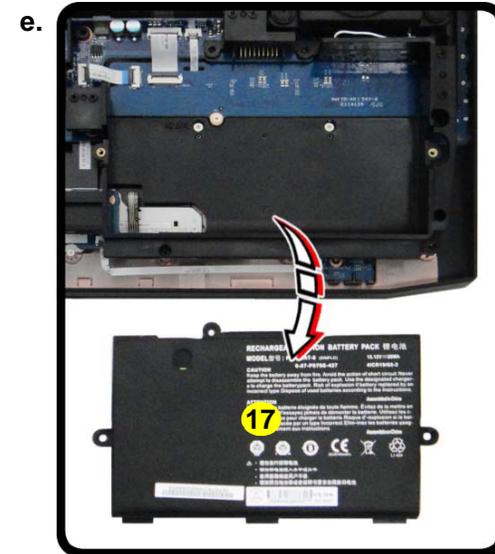

10. Bottom Case
• 9 Screws

Disassembly

Figure 2 Battery Removal (cont'd.)

- d. Remove the screws.
- e. Lift the battery off the computer.
- f. Reinsert the bottom case and tighten the screws.

5. Carefully remove screws **13** - **16** (*Figure 2b*).
6. Lift the battery **17** off the computer (*Figure 2e*).
7. Reinsert the bottom case starting from point **18** as shown (*Figure 2f*) to avoid damaging the rear eSATA/USB 3.0 port. Tighten the screws to secure the bottom case in place.



17. Battery

- 4 Screws

Disassembly

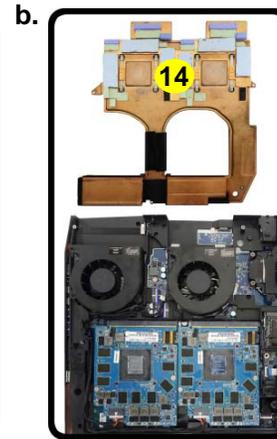
Figure 9 Video Card Removal Procedure

- Remove the screws in the correct order.
- Carefully remove the heat sink units.
- Remove the video card cable connector and screws. The video card will pop up.
- Remove the video card.

Removing and Installing the Video Card

Video Card Removal Procedure

- Turn **off** the computer, turn it over and remove the battery ([page 2 - 5](#)).
- Remove screws **1 - 12** from the heat sink unit in the order indicated on the label (i.e screw **12** first through to screw **1** last) ([Figure 9a](#)).
- Carefully (**it may be hot**) remove the heat sink unit **14** by lifting it by the tabs **13** ([Figure 9b](#)).
- Remove the connector **15** & **16** and screws **17 - 20** from the video card. The video card **21** will pop up.
- Remove the video card **21** ([Figure 9d](#)).

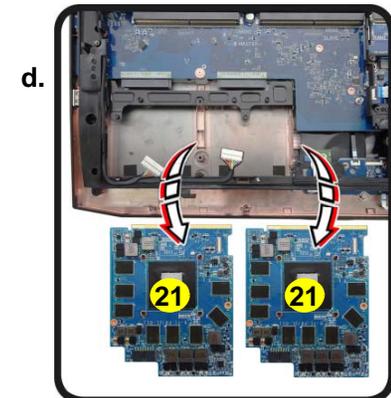
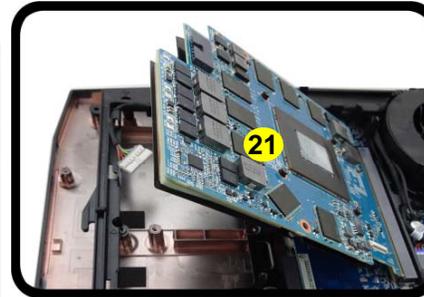
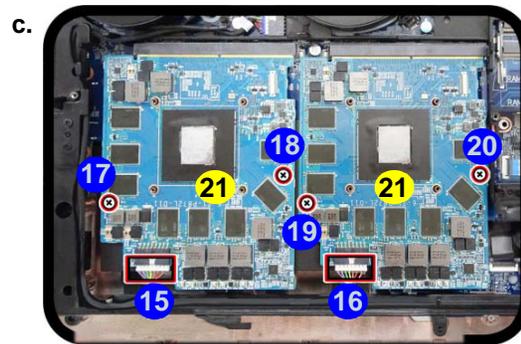




Heat Sink Screw Removal and Insertion

Remove the screws from the heat sink in the order indicated here: **16-15-14-3-2-1**.

When tightening the screws, make sure that they are tightened in the order: **1-2-3-14-15-16**.



Caution

The heat sink, and video card area in general, contains parts which are subject to high temperatures. Allow the area time to cool before removing these parts.

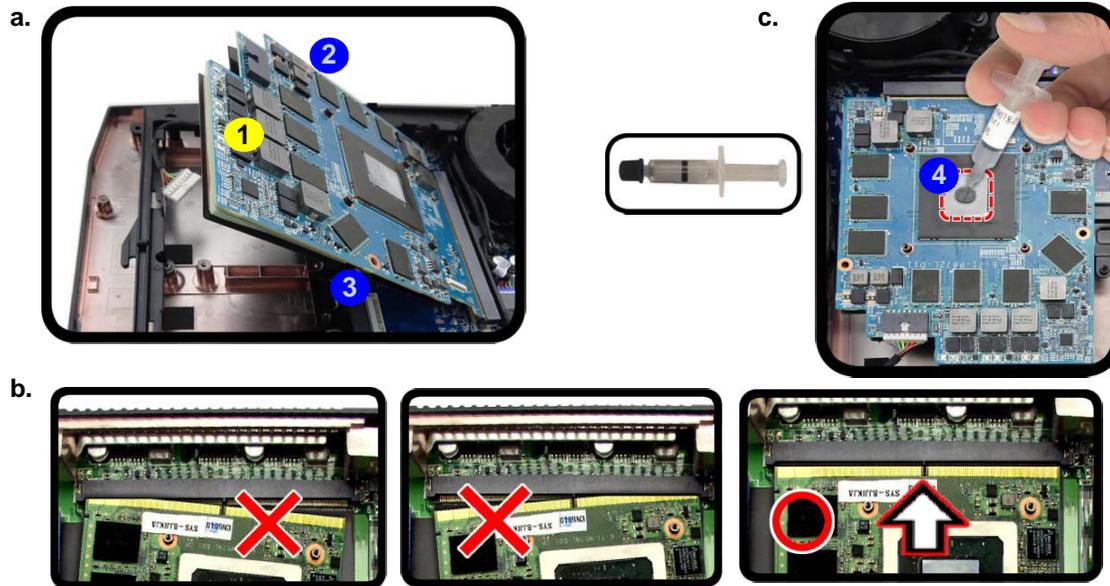


14. Heat Sink Unit
21. Video Cards

- 20 Screws

Installing a New Video Card

1. Prepare to fit the video card **1** into the slot by holding it at about a 30° angle (*Figure 10a*).
2. The card needs to be fully into the slot, and the video card and socket have a guide-key and pin which align to allow the card to fit securely (*Figure 10b*).
3. Fit the connectors firmly into the socket, straight and evenly.



4. DO NOT attempt to push one end of the card in ahead of the other.
5. The card's pin alignment will allow it to only fit one way. **Make sure the module is seated as far into the socket as it will go.** DO NOT FORCE the card; it should fit without much pressure.
6. Secure the card with screws **2** & **3** (*Figure 9 on page 2 - 14*).
7. Apply the whole tube of the thermal grease **4** to the center of main chip of the video card as shown (*Figure 10c*).
8. Place the heat sink back on the card, and secure the screws in the order indicated in *Figure 9 on page 2 - 14*.
9. Reinsert the component bay cover, and secure with the screws as indicated in *Figure 2 on page 2 - 6*.

Figure 10
Installing a New Video Card

- a. Insert the video card at a 30 degree angle.
- b. Fit the connectors straight and even, and secure the card with the screws.
- c. Apply thermal grease.



Caution

The heat sink, and video card area in general, contains parts which are subject to high temperatures. Allow the area time to cool before removing these parts.



1. Video Card
- 2 Screws