What Is Claimed Is:

1. A payment-processing apparatus, comprising:

a camera module;

a first communication interface configured to receive, from a standalone point-of-sale (POS) terminal, a start-up command for starting up the payment-processing apparatus; and

a second communication interface configured to:

request, from a remote computing device, a type of facial information needed to perform a facial-recognition operation at the remote computing device, in response to the first communication interface receiving the start-up command from the standalone POS terminal;

receive, from the remote computing device, facial-recognition parameters specific to the type of facial information needed to perform the facial-recognition operation, wherein the received facial recognition parameters comprise at least a liveness-detection parameter;

wherein the camera module is configured to turn on to collect facial information of a customer based on the received facial-recognition parameters in response to the first communication interface receiving the start-up command from the standalone POS terminal;

wherein the second communication interface is further configured to send the collected facial information to the remote computing device, thereby allowing the remote computing device to perform the facial-recognition operation to identify a customer account based on the collected facial information; and

wherein the POS terminal is to complete a transaction based on the identified customer account.

2. The payment-processing apparatus of claim 1, wherein the first communication interface comprises a universal serial bus (USB) interface, a Bluetooth™ interface, or a WiFi™ interface.

3. The payment-processing apparatus of claim 1, wherein the second communication interface is configured to receive, from the remote computing device, a transaction-authorization code, which is generated by the remote computing device based on the identified customer account.

4. The payment-processing apparatus of claim 3, wherein the first communication interface is configured to forward, to the standalone POS terminal, the transaction-authorization code to allow the standalone POS terminal to submit a payment request to the customer account based on the transaction-authorization code and a payment amount.

5. The payment-processing apparatus of claim 1, wherein the type of facial information comprises one or more of:

a two-dimensional (2D) image;

a three-dimensional (3D) image; and

a feature vector.

6. The payment-processing apparatus of claim 1, further comprising an input module configured to receive additional security information from the customer.

7. The payment-processing apparatus of claim 6, wherein the second communication interface is further configured to transmit the additional security information to the remote computing device, thereby allowing the remote computing device to verify the customer's identity based on the additional security information.

8. The payment-processing apparatus of claim 1, further comprising a display module configured to:

display information associated with the identified customer account; and

display a payment result.

9. The payment-processing apparatus of claim 1, wherein the remote computing device comprises a facial information database storing facial information of a plurality of customers.

10. The payment-processing apparatus of claim 1, wherein the standalone POS terminal is configured to perform one or more of:

determining price;

calculating payment sum; and

processing a coupon.

11. A computer-implemented payment-processing method, comprising:

receiving, by a payment-processing device from a standalone point-of-sale (POS) terminal, a start-up command for starting up the payment-processing device, wherein the

start-up command is received via a first communication interface between the payment-processing device and the standalone POS terminal,;

in response to receiving the start-up command, requesting, by the payment-processing device, from a remote computing device, a type of facial information needed to perform a facial-recognition operation to be performed by the remote computing device;

receiving, via a second communication interface between the payment-processing device and the remote computing device, facial-recognition parameters specific to the type of facial information needed to perform the facial-recognition operation, wherein the received facial recognition parameters comprise at least a liveness-detection parameter;

in response to receiving the start-up command and the facial-recognition parameters, obtaining, by a camera associated with the payment-processing device, facial information of a customer based on the received facial-recognition parameters;

transmitting, by the payment-processing device, the facial information to the remote computing device via the second communication interface to allow the remote computing device to perform the facial-recognition operation to identify a customer account based on the facial information;

receiving, from the remote computing device via the second communication interface, a transaction-authorization code associated with the customer account;

forwarding, via the first communication interface, the transaction-authorization code to the standalone POS terminal; and

completing, by the standalone POS terminal, a transaction based on the transaction-authorization code.

12. The computer-implemented method of claim 11, wherein the first communication interface comprises a universal serial bus (USB) interface, a Bluetooth™ interface, or a WiFi™ interface.

13. The computer-implemented method of claim 11, wherein the standalone POS terminal is configured to submit a payment request to the account associated with the customer based on the transaction-authorization code and a payment amount.

14. The computer-implemented method of claim 11, wherein the type of facial information comprises one or more of:

a two-dimensional (2D) image;

a three-dimensional (3D) image; and

a feature vector.

15. The computer-implemented method of claim 11, further comprising receiving additional security information from the customer.

16. The computer-implemented method of claim 15, further comprising transmitting the additional security information to the remote computing device to allow the remote computing device to verify the customer's identity based on the additional security information.

17. The computer-implemented method of claim 11, further comprising:

displaying information associated with the identified customer account; and

displaying a payment result.

18. The computer-implemented method of claim 11, wherein the remote computing device comprises a facial information database storing facial information of a plurality of customers.

19. The computer-implemented method of claim 11, wherein the standalone POS terminal is configured to perform one or more of:

determining price;

calculating payment sum; and

processing a coupon.