

CLAIMS

What is claimed is:

1. A computer-implemented system for stowing products, the system comprising:
a memory storing instructions; and
at least one processor configured to execute the instructions to:
receive, from a user device associated with a user, a tote identifier associated with a tote containing at least one product for stowing;
predict, based on the tote identifier, a location for stowing the at least one product contained in the tote;
provide, to the user device, a location recommendation for stowing the at least one product contained in the tote based on the predicted location;
receive, from the user device, a product identifier associated with the at least one product, a location identifier associated with a position at which the at least one product is to be stowed, and a quantity of the at least one product to be stowed;
modify a database to assign the location identifier and the quantity to the product identifier;
receive, from the user device, a notification of a stowing error associated with the tote identifier;
modify the database to assign the stowing error to the tote identifier;
and
automatically report the stowing error to a remote device.

2. The system of claim 1, wherein the product identifier associated with the at least one product comprises a stock keeping unit (SKU) associated with the at least one product.
3. The system of claim 1, wherein predicting the location for stowing the at least one product contained in the tote comprises:
 - determining a location of the user device;
 - determining empty locations within a fulfillment center capable of receiving the at least one product; and
 - selecting, among the determined empty locations, an empty location closest to the location of the user device as the location for stowing the at least one product.
4. The system of claim 1, wherein the stowing error comprises at least one of an overage or a shortage.
5. The system of claim 1, wherein, when the tote identifier is scanned, the at least one processor is further configured to execute the instructions to send a cause of the stowing error for display to the user device.
6. The system of claim 4, wherein, when a physical quantity of the at least one product is greater than an expected quantity of the at least one product, the stowing error comprises overage.

7. The system of claim 4, wherein, when a physical quantity of the at least one product is less than an expected quantity of the at least one product, the stowing error comprises shortage.
8. The system of claim 6, wherein, when the stowing error comprises overage, the at least one processor is configured to execute the instructions to determine a cause for the overage, the cause for the overage comprising at least one of a product damage, a barcode damage, or an incorrect product.
9. The system of claim 7, wherein, when the stowing error comprises shortage, the at least one processor is configured to execute the instructions to:
 - request, via the user device, a difference between the physical quantity of the at least one product and the expected quantity of the at least one product; and
 - store the difference in the database.
10. The system of claim 8, wherein, when the cause for the overage comprises at least one of the product damage or the barcode damage, the at least one processor is further configured to execute the instructions to provide, via the user device, a location recommendation for transferring at least one product with at least one of the product damage or the barcode damage.
11. A computer-implemented method for stowing products, the method comprising:

receiving, from a user device associated with a user, a tote identifier associated with a tote containing at least one product for stowing;

predicting, based on the tote identifier, a location for stowing the at least one product contained in the tote;

providing, to the user device, a location recommendation for stowing the at least one product contained in the tote based on the predicted location;

receiving, from the user device, a product identifier associated with the at least one product, a location identifier associated with a position at which the at least one product is to be stowed, and a quantity of the at least one product to be stowed;

modifying a database to assign the location identifier and the quantity to the product identifier;

receiving, from the user device, a notification of a stowing error associated with the tote identifier;

modifying the database to assign the stowing error to the tote identifier;

and

automatically reporting the stowing error to a remote device.

12. The method of claim 11, wherein predicting the location for stowing the at least one product contained in the tote comprises:
- determining a location of the user device;
 - determining empty locations within a fulfillment center capable of receiving the at least one product; and

selecting, among the determined empty locations, an empty location closest to the location of the user device as the location for stowing the at least one product.

13. The method of claim 11, wherein the stowing error comprises at least one of an overage or a shortage.
14. The method of claim 11, further comprising sending a cause of the stowing error for display displaying to the user device.
15. The method of claim 13, wherein, when a physical quantity of the at least one product is greater than an expected quantity of the at least one product, the stowing error comprises overage.
16. The method of claim 13, wherein, when a physical quantity of the at least one product is less than an expected quantity of the at least one product, the stowing error comprises shortage.
17. The method of claim 15, further comprising:

when the stowing error comprises overage, determining a cause for the overage, the cause for the overage comprising at least one of a product damage, a barcode damage, or an incorrect product;
and
18. The method of claim 16, further comprising:

when the stowing error comprises shortage, requesting, via the user device, a difference between the physical quantity of the at least one product and the expected quantity of the at least one product; and
storing the difference in the database.

19. The method of claim 17, further comprising:

when the cause for the overage comprises at least one of the product damage or the barcode damage, providing, via the user device, a location recommendation for transferring at least one product with at least one of the product damage or the barcode damage.

20. A computer-implemented system for stowing products, the system comprising:

a memory storing instructions; and

at least one processor configured to execute the instructions to:

receive, from a user device associated with a user, a tote identifier associated with a tote containing at least one product for stowing; predict, based on the tote identifier, a location for stowing the at least one product contained in the tote, wherein predicting the location for stowing the at least one product contained in the tote comprises:
determining a location of the user device;

determining empty locations within a fulfillment center
that is capable of receiving the at least one
product; and
selecting, among the determined empty locations, an
empty location closest to the location of the user
device as the location for stowing the at least one
product;
provide, to the user device, a location recommendation for stowing the
at least one product contained in the tote based on the predicted
location;
receive, from the user device, a product identifier associated with the at
least one product, a location identifier associated with a position
at which the at least one product is to be stowed, and a quantity
of the at least one product to be stowed;
modify a database to assign the location identifier and the quantity to
the product identifier;
receive, from the user device, a notification of a stowing error
associated with the tote identifier, the stowing error comprising
at least one of an overage or a shortage;
modify the database to assign the stowing error to the tote identifier;
and
automatically report the stowing error to a remote device, wherein:
when the stowing error comprises overage, the at least one
processor is configured to execute the instructions to:

determine a cause for the overage, the cause for the overage comprising at least one of a product damage or a barcode damage; and provide, via the user device, a location recommendation for transferring at least one product with at least one of the product damage or the barcode damage; and when the stowing error comprises shortage, the at least one processor is configured to execute the instructions to: request, via the user device, a difference between the physical quantity of the at least one product and the expected quantity of the at least one product; and store the difference in the database.