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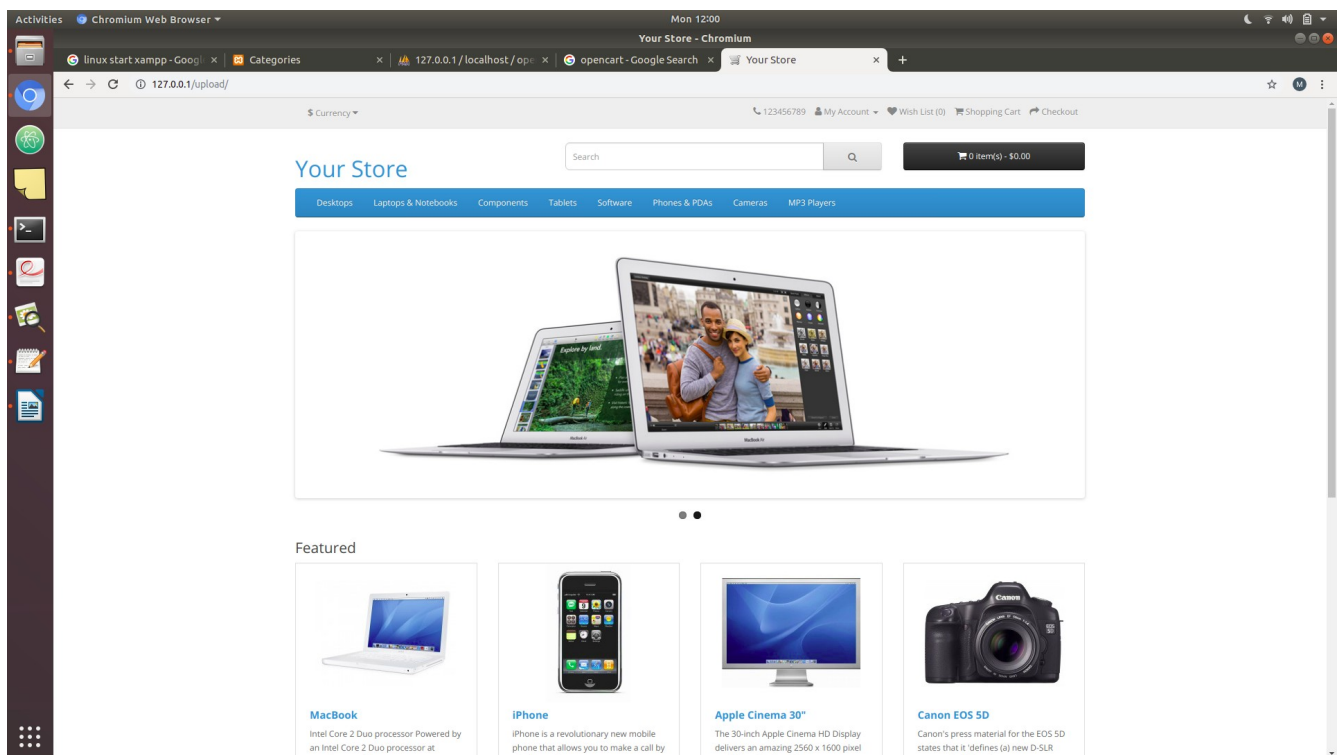
OPENCART

OpenCart is an Open-Source E-Commerce System, which utilizes PHP and MySQL Database.

• INSTALLATION

After downloading zip file from website, it is extracted in XAMP's htdocs folder which is situated in *opt/lampp/htdocs/*. The setup is to be ran only first time after which 'install' folder is deleted from htdocs folder.

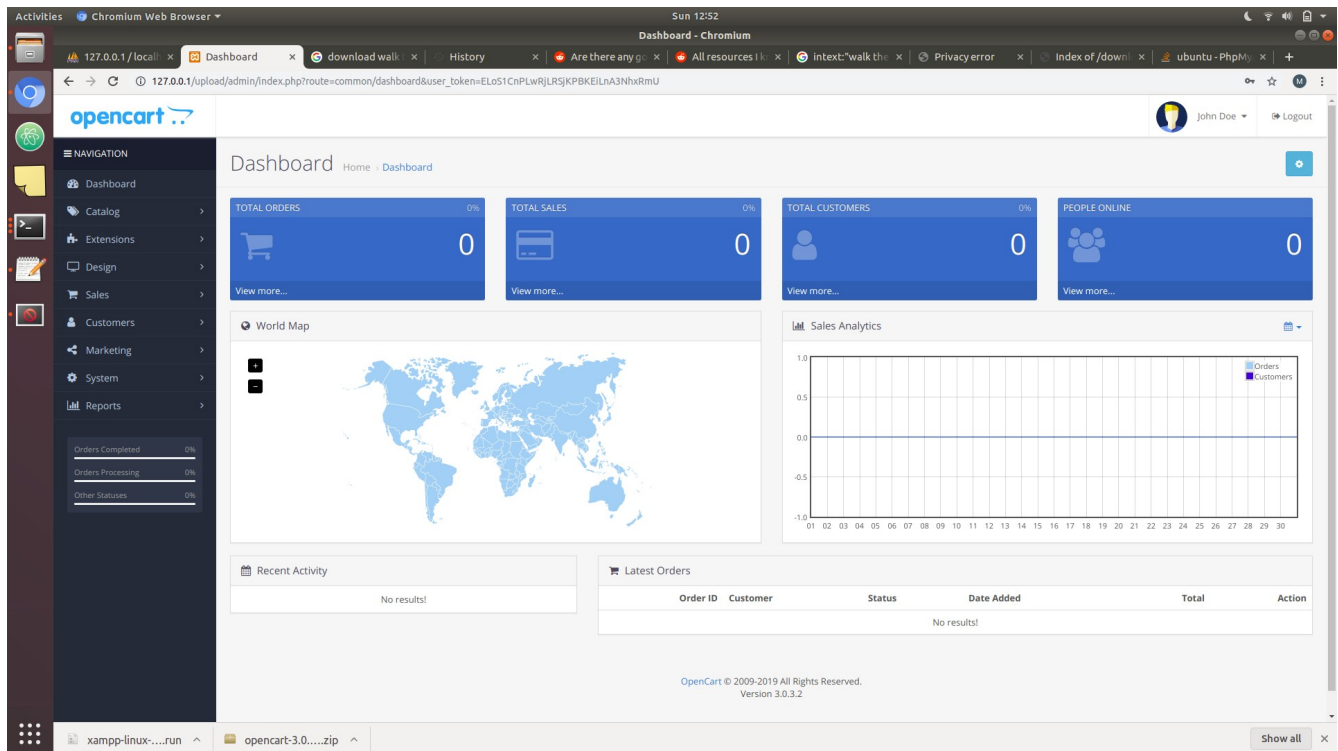
• USER PERSPECTIVE



After successful installation, above image represents the first look on the front-end. As you can see it is situated in localhost/upload/ domain. The products shown are for demo-purpose only.

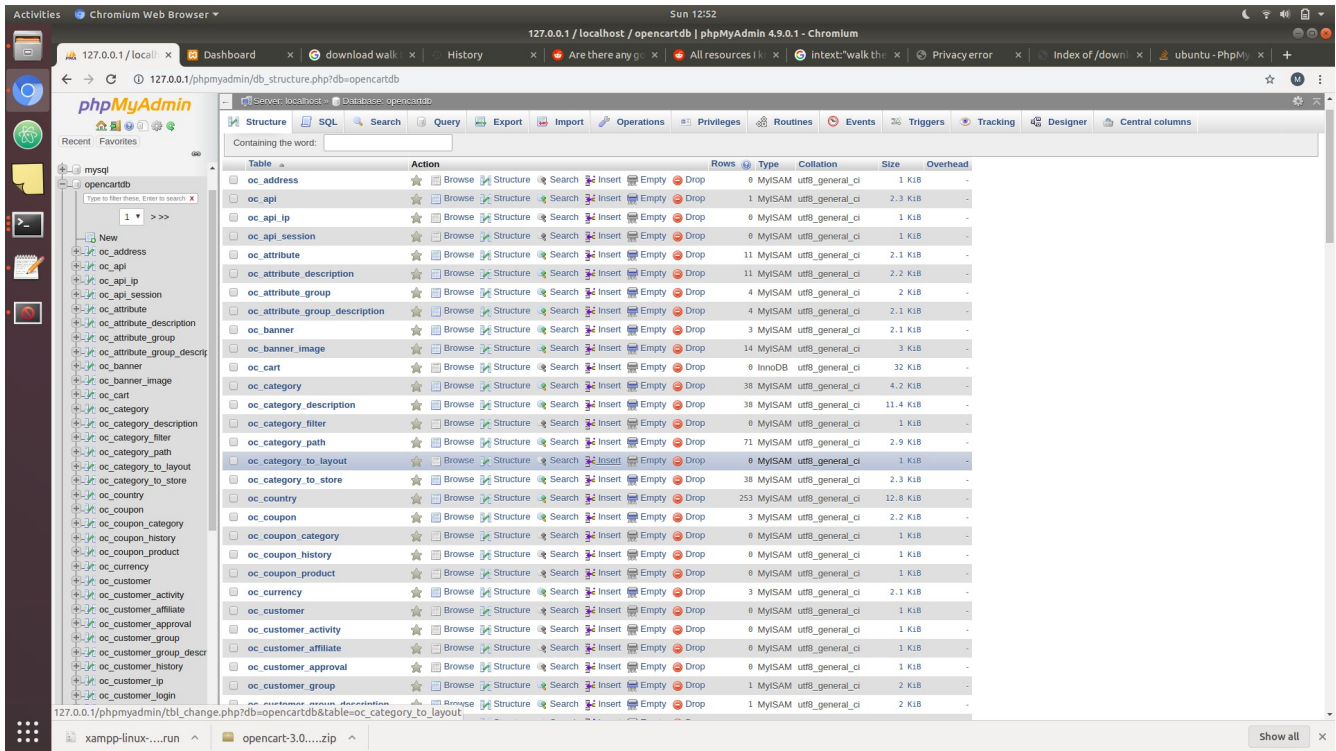
• ADMIN PORTAL

Open Cart has its own admin portal where different categories, products, currencies etc can be added without coding. Next Screenshot provides a first look of the portal.



Resources can be managed from 'Catalog' drop down on left side of the page. This page represents fully any resources, and purchases made from different areas over the globe, and also allows to manage currencies. The sale graph also shows any sales made in graphical format.

• DATABASE



The screenshot displays the phpMyAdmin web interface in a Chromium browser. The address bar shows the URL '127.0.0.1/phpmyadmin/db_structure.php?db=opencartdb'. The interface is titled 'Database: opencartdb' and includes a top navigation bar with tabs for Structure, SQL, Search, Query, Export, Import, Operations, Privileges, Routines, Events, Triggers, Tracking, Designer, and Central columns. A search bar is present above the table list. On the left, a sidebar shows the 'Recent Favorites' and a tree view of the database structure. The main area displays a list of tables in the 'opencartdb' database, each with a star icon and a set of action links (Browse, Structure, Search, Insert, Empty, Drop). The table list includes columns for Table, Action, Rows, Type, Collation, Size, and Overhead. The tables listed are: oc_address, oc_api, oc_api_ip, oc_api_session, oc_attribute, oc_attribute_description, oc_attribute_group, oc_attribute_group_description, oc_banner, oc_banner_image, oc_cart, oc_category, oc_category_description, oc_category_filter, oc_category_path, oc_category_to_layout, oc_category_to_store, oc_country, oc_coupon, oc_coupon_category, oc_coupon_history, oc_coupon_product, oc_coupon_history, oc_currency, oc_customer, oc_customer_activity, oc_customer_approval, oc_customer_group, oc_customer_group_description, oc_customer_group_ip, and oc_customer_login.

Table	Action	Rows	Type	Collation	Size	Overhead
oc_address	★ Browse Structure Search Insert Empty Drop	0	MyISAM	utf8_general_ci	1 KIB	-
oc_api	★ Browse Structure Search Insert Empty Drop	1	MyISAM	utf8_general_ci	2.3 KIB	-
oc_api_ip	★ Browse Structure Search Insert Empty Drop	0	MyISAM	utf8_general_ci	1 KIB	-
oc_api_session	★ Browse Structure Search Insert Empty Drop	0	MyISAM	utf8_general_ci	1 KIB	-
oc_attribute	★ Browse Structure Search Insert Empty Drop	11	MyISAM	utf8_general_ci	2.1 KIB	-
oc_attribute_description	★ Browse Structure Search Insert Empty Drop	11	MyISAM	utf8_general_ci	2.2 KIB	-
oc_attribute_group	★ Browse Structure Search Insert Empty Drop	4	MyISAM	utf8_general_ci	2 KIB	-
oc_attribute_group_description	★ Browse Structure Search Insert Empty Drop	4	MyISAM	utf8_general_ci	2.1 KIB	-
oc_banner	★ Browse Structure Search Insert Empty Drop	3	MyISAM	utf8_general_ci	2.1 KIB	-
oc_banner_image	★ Browse Structure Search Insert Empty Drop	14	MyISAM	utf8_general_ci	3 KIB	-
oc_cart	★ Browse Structure Search Insert Empty Drop	0	InnoDB	utf8_general_ci	32 KIB	-
oc_category	★ Browse Structure Search Insert Empty Drop	38	MyISAM	utf8_general_ci	4.2 KIB	-
oc_category_description	★ Browse Structure Search Insert Empty Drop	38	MyISAM	utf8_general_ci	11.4 KIB	-
oc_category_filter	★ Browse Structure Search Insert Empty Drop	0	MyISAM	utf8_general_ci	1 KIB	-
oc_category_path	★ Browse Structure Search Insert Empty Drop	71	MyISAM	utf8_general_ci	2.9 KIB	-
oc_category_to_layout	★ Browse Structure Search Insert Empty Drop	0	MyISAM	utf8_general_ci	1 KIB	-
oc_category_to_store	★ Browse Structure Search Insert Empty Drop	38	MyISAM	utf8_general_ci	2.3 KIB	-
oc_country	★ Browse Structure Search Insert Empty Drop	253	MyISAM	utf8_general_ci	12.8 KIB	-
oc_coupon	★ Browse Structure Search Insert Empty Drop	3	MyISAM	utf8_general_ci	2.2 KIB	-
oc_coupon_category	★ Browse Structure Search Insert Empty Drop	0	MyISAM	utf8_general_ci	1 KIB	-
oc_coupon_history	★ Browse Structure Search Insert Empty Drop	0	MyISAM	utf8_general_ci	1 KIB	-
oc_coupon_product	★ Browse Structure Search Insert Empty Drop	0	MyISAM	utf8_general_ci	1 KIB	-
oc_currency	★ Browse Structure Search Insert Empty Drop	3	MyISAM	utf8_general_ci	2.1 KIB	-
oc_customer	★ Browse Structure Search Insert Empty Drop	0	MyISAM	utf8_general_ci	1 KIB	-
oc_customer_activity	★ Browse Structure Search Insert Empty Drop	0	MyISAM	utf8_general_ci	1 KIB	-
oc_customer_approval	★ Browse Structure Search Insert Empty Drop	0	MyISAM	utf8_general_ci	1 KIB	-
oc_customer_group	★ Browse Structure Search Insert Empty Drop	1	MyISAM	utf8_general_ci	2 KIB	-
oc_customer_group_description	★ Browse Structure Search Insert Empty Drop	1	MyISAM	utf8_general_ci	2 KIB	-
oc_customer_group_ip	★ Browse Structure Search Insert Empty Drop	1	MyISAM	utf8_general_ci	2 KIB	-
oc_customer_login	★ Browse Structure Search Insert Empty Drop	1	MyISAM	utf8_general_ci	2 KIB	-

While installing OpenCart asked for a newly-created database which can be populated. I created 'opencartdb' for this purpose. Above screenshot represents a subset of the database. Different tables are available to deal with respectable resources. For the sake of this report, I will only showcase product table:

Activities Chromium Web Browser Mon 11:53

127.0.0.1 / localhost / opencartdb / oc_product | phpMyAdmin 4.9.0.1 - Chromium

linux start xampp - Google Categories 127.0.0.1 / localhost / opencartdb / oc_product

phpMyAdmin

Server: localhost Database: opencartdb Table: oc_product

Options

Show all Number of rows: 25 Filter rows: Search this table Sort by key: None

	product_id	model	sku	upc	ean	jan	isbn	mpn	location	quantity	stock_status_id	image	manufacturer_id	shipping	price	points	tax_class_id
<input type="checkbox"/>	28	Product 1								939	7	catalog/demo/htc_touch_hd_1.jpg	5	1	100.0000	200	9 2
<input type="checkbox"/>	29	Product 2								999	6	catalog/demo/palm_treo_pro_1.jpg	6	1	279.9900	0	9 2
<input type="checkbox"/>	30	Product 3								7	6	catalog/demo/canon_eos_5d_1.jpg	9	1	100.0000	0	9 2
<input type="checkbox"/>	31	Product 4								1000	6	catalog/demo/nikon_d300_1.jpg	0	1	80.0000	0	9 2
<input type="checkbox"/>	32	Product 5								999	6	catalog/demo/ipod_touch_1.jpg	8	1	100.0000	0	9 2
<input type="checkbox"/>	33	Product 6								1000	6	catalog/demo/samsung_syncmaster_941bw.jpg	0	1	200.0000	0	9 2
<input type="checkbox"/>	34	Product 7								1000	6	catalog/demo/ipod_shuffle_1.jpg	8	1	100.0000	0	9 2
<input type="checkbox"/>	35	Product 8								1000	5		0	0	100.0000	0	9 2
<input type="checkbox"/>	36	Product 9								994	6	catalog/demo/ipod_nano_1.jpg	8	0	100.0000	100	9 2
<input type="checkbox"/>	40	Product 11								970	5	catalog/demo/iphone_1.jpg	8	1	101.0000	0	9 2
<input type="checkbox"/>	41	Product 14								977	5	catalog/demo/imac_1.jpg	8	1	100.0000	0	9 2
<input type="checkbox"/>	42	Product 15								990	5	catalog/demo/apple_cinema_30.jpg	8	1	100.0000	400	9 2
<input type="checkbox"/>	43	Product 16								929	5	catalog/demo/macbook_1.jpg	8	0	500.0000	0	9 2
<input type="checkbox"/>	44	Product 17								1000	5	catalog/demo/macbook_air_1.jpg	8	1	1000.0000	0	9 2
<input type="checkbox"/>	45	Product 18								998	5	catalog/demo/macbook_pro_1.jpg	8	1	2000.0000	0	100 2
<input type="checkbox"/>	46	Product 19								1000	5	catalog/demo/sony_vaio_1.jpg	10	1	1000.0000	0	9 2
<input type="checkbox"/>	47	Product 21								1000	5	catalog/demo/hp_1.jpg	7	1	100.0000	400	9 2
<input type="checkbox"/>	48	product test 1							test 2	995	5	catalog/demo/ipod_classic_1.jpg	8	1	100.0000	0	9 2
<input type="checkbox"/>	49	SAM1								0	8	catalog/demo/samsung_tab_1.jpg	0	1	199.9900	0	9 2

Query results operations

Console

ProductId is the key-attribute and many other other attributes are foreign for example CategoryId.

• CODE

OpenCart also allows source manipulation with coding. Follwong Screenshot represents a .php file for product management.



```
<?php
class ModelCatalogProduct extends Model {
    public function addProduct($data) {
        $this->db->query("INSERT INTO " . DB_PREFIX . "product SET model = '" . $this->db->escape($data['model']) . "', sku = '" . $this->db->escape($data['sku']) . "', upc = '" . $this->db->escape($data['upc']) . "', ean = '" . $this->db->escape($data['ean']) . "', jan = '" . $this->db->escape($data['jan']) . "', isbn = '" . $this->db->escape($data['isbn']) . "', mpn = '" . $this->db->escape($data['mpn']) . "', location = '" . $this->db->escape($data['location']) . "', quantity = '" . (int)$data['quantity'] . "', minimum = '" . (int)$data['minimum'] . "', subtract = '" . (int)$data['subtract'] . "', stock_status_id = '" . (int)$data['stock_status_id'] . "', date_available = '" . $this->db->escape($data['date_available']) . "', manufacturer_id = '" . (int)$data['manufacturer_id'] . "', shipping = '" . (int)$data['shipping'] . "', price = '" . (float)$data['price'] . "', points = '" . (int)$data['points'] . "', weight = '" . (float)$data['weight'] . "', weight_class_id = '" . (int)$data['weight_class_id'] . "', length = '" . (float)$data['length'] . "', width = '" . (float)$data['width'] . "', height = '" . (float)$data['height'] . "', length_class_id = '" . (int)$data['length_class_id'] . "', status = '" . (int)$data['status'] . "', tax_class_id = '" . (int)$data['tax_class_id'] . "', sort_order = '" . (int)$data['sort_order'] . "', date_added = NOW(), date_modified = NOW()");

        $product_id = $this->db->getLastId();

        if (isset($data['image'])) {
            $this->db->query("UPDATE " . DB_PREFIX . "product SET image = '" . $this->db->escape($data['image']) . "' WHERE product_id = '" . (int)$product_id . "'");
        }

        foreach ($data['product_description'] as $language_id => $value) {
            $this->db->query("INSERT INTO " . DB_PREFIX . "product_description SET product_id = '" . (int)$product_id . "', language_id = '" . (int)$language_id . "', name = '" . $this->db->escape($value['name']) . "', description = '" . $this->db->escape($value['description']) . "', tag = '" . $this->db->escape($value['tag']) . "', meta_title = '" . $this->db->escape($value['meta_title']) . "', meta_description = '" . $this->db->escape($value['meta_description']) . "', meta_keyword = '" . $this->db->escape($value['meta_keyword']) . "'");
        }

        if (isset($data['product_store'])) {
            foreach ($data['product_store'] as $store_id) {
                $this->db->query("INSERT INTO " . DB_PREFIX . "product_to_store SET product_id = '" . (int)$product_id . "', store_id = '" . (int)$store_id . "'");
            }
        }

        if (isset($data['product_attribute'])) {
            foreach ($data['product_attribute'] as $product_attribute) {
                if ($product_attribute['attribute_id']) {
                    // Removes duplicates
                    $this->db->query("DELETE FROM " . DB_PREFIX . "product_attribute WHERE product_id = '" . (int)$product_id . "' AND attribute_id = '" . (int)$product_attribute['attribute_id'] . "'");
                    foreach ($product_attribute['product_attribute_description'] as $language_id => $product_attribute_description) {
                        $this->db->query("DELETE FROM " . DB_PREFIX . "product_attribute WHERE product_id = '" . (int)$product_id . "' AND attribute_id = '" . (int)$product_attribute['attribute_id'] . "' AND language_id = '" . (int)$language_id . "'");
                        $this->db->query("INSERT INTO " . DB_PREFIX . "product_attribute SET product_id = '" . (int)$product_id . "', attribute_id = '" . (int)$product_attribute['attribute_id'] . "', language_id = '" . (int)$language_id . "', text = '" . $this->db->escape($product_attribute_description['text']) . "'");
                    }
                }
            }
        }

        if (isset($data['product_option'])) {
            foreach ($data['product_option'] as $product_option) {
                if ($product_option['type'] == 'select' || $product_option['type'] == 'radio' || $product_option['type'] == 'checkbox' || $product_option['type'] == 'image') {
                    if (isset($product_option['product_option_value'])) {
                        $this->db->query("INSERT INTO " . DB_PREFIX . "product_option SET product_id = '" . (int)$product_id . "', option_id = '" . (int)$product_option['option_id'] . "', required = '" . (int)$product_option['required'] . "'");
                    }
                }
            }
        }
    }
}
```

This code represents the back-end of the admin portal from where products are added. As you can see from the code of function addProduct, it directs addition to SQL Database. We can manipulate it for our needs but for now we will leave it as it is.

• WIDGET

I installed a Theme called 'Nou Free-OC 3'. The procedure for installation was as follows:

I downloaded the theme.

Uploaded it to the server using FileZilla.

Installed the plugin using OpenCart Admin Portal.

Enabled the plugin using OpenCart Admin Portal.

Activities Chromium Web Browser Mon 19:20

Extension Installer - Chromium

Extension Installer x How to Install a Th x Download FileZilla x OpenCart - Nou - F x How to setup FTP x Download FileZilla x How to setup FTP x sudo -How do I lo x 14.04 -How to star x

127.0.0.1/upload/admin/index.php?route=marketplace/installer&user_token=edGKuf2wpdY5fCkglZVPw1x2AU2VPF

opencart

NAVIGATION

- Dashboard
- Catalog
- Extensions
- Marketplace
- Installer
- Extensions
- Modifications
- Events
- Design
- Sales
- Customers
- Marketing
- System
- Reports

Orders Completed 0%

Orders Processing 0%

Other Statuses 0%

Extension Installer

Home > Extension Installer

Success: You have modified extensions!

Upload your extensions

Upload File Upload

Install Progress

Progress

Install History

Filename	Date Added	Action
Nou-Theme-OCAttic-v1.ocmod.zip	16/09/2019	

Showing 1 to 1 of 1 (1 Pages)

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Version 3.0.3.2

5ce1b6850b9...jpg FileZilla...tar.bz2 Show all

Currency Language My Account Wish List (0) Shopping Cart Checkout

Your Store

Search 0 item(s) - \$0.00

Desktops Laptops & Notebooks Components Tablets Software Phones & PDAs Cameras MP3 Players

NOU THEME

FREE

OC Attic

A

1 2

10 12 11 9 8 4 3

7 6 5

Featured

Product 1

Intel Core 2 Duo processor
Powered by an Intel Core 2 Duo processor at speeds up to 2.1.

\$602.00
Ex Tax: \$500.00

ADD TO CART

Product 2

iPhone is a revolutionary new mobile phone that allows you to make a call by simply tapping a nam.

\$123.20
Ex Tax: \$101.00

ADD TO CART

Product 3

The 30-inch Apple Cinema HD Display delivers an amazing 2560 x 1600 pixel resolution. Designed sp.

\$110.00 \$102.00
Ex Tax: \$90.00

ADD TO CART

Product 4

Canon's press material for the EOS 5D states that it defines (a) new D-SLR category, while awer.

\$98.00 \$122.00
Ex Tax: \$80.00

ADD TO CART