Office 365 ProPlus User Subscriptions in Shared-PC Environments

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Introduction

This paper was conceived when a customer subscribed to Microsoft's Office 365 subscription program for all of its users. The customer subsequently became concerned about deployment of Microsoft Office to its staff and facilities with this new model and asked Microsoft to clarify the customer's rights, in particular its right to continue to use centralized deployment with the Office 365 Professional Plus Subscription software it has purchased.

While the customer had several opinions from Microsoft on this subject, it has asked Pica Communications, LLC, an independent firm with expertise in Microsoft licensing, for its analysis of the customer's rights.

Pica Communications has reviewed relevant contract documents, including the Enterprise Agreement, the Enterprise Enrollment, Product Use Rights, Online Services Terms, and the Microsoft Product List, as well as additional documentation on the Internet in the course of this research.

Our primary focus here is licensing rights, but technical issues also come into play, since Office obtained through subscription and Office obtained through perpetual licenses are different products, particularly when it comes to product activation issues. While we describe some of the technical issues that arise from the differences between subscription and perpetual licenses for Office, we have done no testing of Office 365 installation, activation, or use and are not qualified to offer expert advice in this area. The customer may need to do additional testing to confirm how these products work, identify any issues associated with activation, and review their management options on the Office 365 portal, among other tasks.

Office 365 Subscriptions vs. Perpetual Licenses

Office purchased as an Office 365 Professional Plus subscription and Office licensed as a perpetual license have many differences, both significant and subtle.



License assignment

Office 365 Pro Plus Subscription

Office purchased as an Office 365 ProPlus subscription is assigned to users.

Office Perpetual License

Office licensed as a perpetual Office Professional Plus or Office Standard license is licensed to devices.

Installation Rights

Office 365 Pro Plus Subscription

The Office 365 ProPlus Subscription permits Office to be installed on up to five PCs, five tablets, and five smartphones, for use by one user.

Office Perpetual License

Office perpetual licenses permit Office to be installed on one PC or tablet, for use by all users of that PC or tablet. (A second install on a portable PC is permitted in some cases, but not for customers with Office in an Enterprise Agreement.)

Deployment

Office 365 Pro Plus Subscription

Office 365 ProPlus obtained through subscription can be installed over the Internet from the Office 365 Portal, installed from a local network by users, pushed out by System Center Configuration Manager, or included in a deployable image.

Office Perpetual License

Volume licensed perpetual software can be deployed from a disk, installed by users from a network installation point, or built into a standard image.

Activation

Office 365 Pro Plus Subscription

Office 365 ProPlus is activated when any component of the software is first used. At that point it gets a temporary token from the Office365 portal. Full activation occurs when a user logs on to the portal. The user must connect to the portal every 30 days or the software will enter reduced functionality mode.

Office Perpetual License

Office Professional Plus can be activated via Multiple Access Keys (MAK) or Key Management System (KMS), both of which can operate silently. No user interaction is required. KMS activation must be refreshed every 180 days and will occur automatically whenever the device connects to the internal network.



User Privileges

Office 365 Pro Plus Subscription

Click-to-run installations of Office 365 ProPlus require that the user have local administration privileges. Deployment as part of an image does not require local administration privileges.

Office Perpetual License

Office Professional Plus permits distribution of Office via re-imaging, when the device is first deployed or when it is repaired via reimaging. This approach does not require administrative privileges. Deployment from a network share or an installation disk or .ISO may require administrative privileges.

Use of Prior Versions

Office 365 Pro Plus Subscription

Office 365 Professional Plus is automatically maintained, updated with new features, and upgraded to a new version through the online service. It has no downgrade rights.

Office Perpetual License

Office Professional Plus, purchased through volume licensing, can be downgraded to any previous Professional Plus, Enterprise, or Professional version of Office. It can be maintained at the current image and be patched with security and bug fixes, but will not be automatically upgraded to a new version.

Instances per Device

Office 365 Pro Plus Subscription

Organizations that use local virtual machines (installed on the PC) can install Office 365 ProPlus in virtual operating system environments on a PC, but each virtual machine counts against the maximum of five Office installations permitted. Each will run the latest version of Office.

Office Perpetual License

Each Office Professional Plus perpetual license permits installation of unlimited instances of Office Professional Plus, of any version, on the licensed device. An organization may want to run multiple versions of Office on a single device by installing different versions of Office, each in its own virtual machine.

Users per Device

Office 365 Pro Plus Subscription

Both for licensing reasons (tracking the five devices covered by a single user's subscription; a 90-day limit on reassigning Office 365 ProPlus licenses) and technical considerations (tracking device-user associations from multiple users on one device could have unintended consequences), only the licensed user is permitted to use an instance of Office 365 ProPlus installed on one of their devices. Generic accounts used to get around this limitation violate the basic rules of Microsoft user licensing. In any case even generic accounts are limited to five PCs each, and each generic account will require separate



payment. A PC can be used by multiple employees if the organization implements a Remote Desktop Services alternative (described in "Shared Computer Activation" below).

Office Perpetual License

Anyone can use a licensed instance of Office Professional Plus installed on a device. Log-ons are not required, and generic accounts can be used without limit. (Log-ons may be desirable for other reasons, such as permitting users with different privileges to access confidential information, but use of Office does not require a log-on.)

Unlicensed Users Prohibited

Office 365 Pro Plus Subscription

Unlicensed users are not permitted to use an instance of Office 365 ProPlus (or Windows) license per user. This flows from simple logic and is stated explicitly in any Enterprise Agreement signed after October 2014.

Enrolled Affiliate may elect to mix Enterprise Products and the corresponding Enterprise Online Services within a Product pool as long as all devices not covered by an Enterprise Product are only used by users covered with a per user license.

Office 365 Pro Plus is an Enterprise Online Service licensed by user and a visiting doctor or a patient's relative would not use a PC in a patient's room unless the hospital purchased a subscription for them and they logged on to no more than five PCs with their account. Use of generic accounts also violates a prohibition against use of a user-licensed device by any unlicensed user.

Office Perpetual License

Office Professional Plus, when purchased in an EA, is an "Enterprise Product" with no limits on who can use it.

Shared Computer Activation

Shared computer activation (SCA) is a workaround that permits shared use of one PC by multiple users.

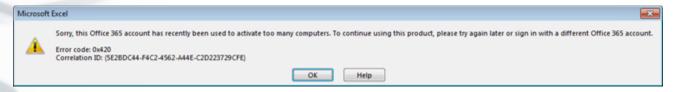
Rather than installing Office 365 ProPlus on the PC, the customer installs the software on a Windows Server and makes it accessible to users via the Remote Desktop Protocol. Users must log on to the PC with their Active Directory log on, and then access the server-based Office 365 ProPlus instance. The user does not need to log on separately to Office Professional Plus if Active Directory is synchronized with Office 365. (Normally, users of Office 365 must log on to their PC and then log on to Office 365).

This approach requires some changes to the Office 365 ProPlus installation script to suppress the Office 365 ProPlus log on.

Microsoft says that accessing Office 365 ProPlus via the SCA workaround does not decrement the number of devices that a user can install Office 365 ProPlus on, so they can still install Office 365 ProPlus on five other PCs as well.



However, the shared instance of Office 365 ProPlus may at some point balk if a user accesses it from too many PCs. This could occur in a nursing ward if, for example, a nurse was visiting each patient's room as well as any shared computers in administrative areas or break rooms.



Microsoft does not say how many PCs a user can log on to before the error appears, only that users can use SCA on "a reasonable number of shared computers in a given time period."

Implications for Hospitals

Office 365 ProPlus subscriptions may be suitable for hospital staff who use Office on a large number of devices, including home PCs and tablets, although the number of people who use more than two devices to do serious editing and creation of Office documents is generally small. As organizations increasingly adopt portable PCs as the sole device for knowledge and mobile workers the benefits of this licensing model decline further.

For example, managers who visit many sites in the hospital—meeting rooms, out-patient facilities, multiple hospital locations—are better served by using a single, portable PC, such as a Microsoft Surface, for all their computing requirements than by having multiple devices that may have different versions of software, different configurations, and different approaches to connectivity.

It is difficult to see why a hospital organization would want to subscribe all of its users in patient-facing environments to Office 365 ProPlus when per-device licensing would be more efficient in most respects.

Disadvantages of subscription licensing for shared devices include:

- The need to license more entities. A hospital ward with 12 beds and seven staff per shift will need approximately 35 full-time equivalent staff to cover all shifts. Assuming that each patient room has one PC, the hospital will need to license about three times as many users (35) as devices (12). Since many healthcare staff work only part time, the number of user licenses is likely higher: user licensing costs are the same for part-time and full-time staff.
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- Higher costs per entity. A PC licensed for Office and the Core CAL Suite can cost as little as \$750¹ to license over a six-year period, which covers all users of the computer. Licensing Office 365 E3 could cost \$1,560 per user, or nearly \$4,700 for three users,² over the same 6-year time frame.
- Requirement for a Remote Desktop Services and CALs. Many healthcare organizations use RDS extensively already, but this adds significant costs—\$203 over six years for RDS user subscription licenses³—to Office 365. Note that in our experience, Microsoft account teams who sell Office 365 to healthcare organizations do not include the cost of RDS CALs that will be necessary to implement Shared Computer Activation.
- Careful management of terminated employees or those who are outside the hospital. Parttime employees who have not received recent call-backs may still have access to Office 365
 accounts from home, unless someone is assigned to terminate their accounts regularly and
 then restart them when they eventually return to work. In the meantime they may have access
 to confidential SharePoint documents and emails stored on Microsoft servers.
- Elimination of generic log-ons. All users must log on under a unique ID. This may require more frequent log-ons (reducing productivity) as well as password resets, such as for temporary or part-time staff who are less likely to remember log-on credentials.
- Potential denial of access to Office for the users who rely on it most, particularly those who log on frequently from different machines and may log on to a different set every day (e.g., dieticians who visit new patients in many different areas of the hospital.) This problem cannot be solved by having them log on to a different PC unless they can find one that they recently logged on to successfully. This could have a significant productivity impact.
 Microsoft has not explained what steps must be taken to reset the device affiliations for a user who can no longer log on to new PCs, but it will presumably require the attention of Office 365 adminstrators who have access to user accounts, creating further overhead and help desk costs.
- No access to hospital PCs by outside doctors, diagnosticians, visiting professionals (legal, financial advisers)

^{3.} The Remote Desktop Services CAL, purchased at an EAC discount, costs \$47.40 for the license and SA per year for three years, plus \$20.28 per year for SA for the following three years.



^{1.} Assuming a Select C Office Pro Plus cost (license-only) of \$354.48 and a Core CAL device CAL LSA price of \$265.80 for three years, followed by Core CAL SA of \$118.08 for three years

^{2.} Anual costs per user, at EA C pricing, include \$218.40 a year for Office 365 E3 and \$41.72 per year for the Enterprise CAL Bridge per user, with platform pricing.

Additional Concerns

Many aspects of Office365 ProPlus licensing, and of user-based licensing are vague and poorly defined, so it is not surprising that many customers report trouble getting verifiable answers.

For example, can two people who both have user licenses share a PC? They are both licensed as users, the software is for use only by employees with user licenses, and it would seem to be legal.

Proof that this is not permitted is never stated explicitly in our survey of the available documentation.

It is implicit, however, in two ways.

1. The one-to-many relationship between an employee with an Office365 ProPlus subscription, suggests that while the user can run Office on many devices, those devices may be used by only one person.

Each user to whom Customer assigns a User SL must have a Microsoft Account in order to use the software provided with the subscription. These users:

• may activate the software provided with the SL on up to five concurrent OSEs for local or remote use;

...

Each user to whom Customer assigns a User SL may also activate Microsoft Office Mobile software to create, edit, or save documents on up to five of user's smartphones and five of user's tablets.

In particular the additional installations are on the "user's" devices. If Microsoft had wanted to say they were open to any user, "five smartphones and five tablets" would be the appropriate language.

In addition, Microsoft has been very specific in the past with device licenses that offer extended privileges, noting that these privileges are associated only with the "primary user" of the device.

2. The convoluted path to shared computer activation is necessary only if user-licensed computers cannot be shared.

The presence of a workaround is not necessary if Office 365 ProPlus on a device can be shared by two users some other way. But in theory (the customer could test this), if two users share a PC and access any Office 365 function to which they are subscribed—not only Office, but Exchange, OneDrive, etc.--Office 365 should either

- Replace the first user's association with the device with the second person's association with the device. This is a de facto license reassignment that cannot occur less than every 90 days, making casual PC sharing risky, or
- Add the second user's association to the PC, in effect assigning the same PC to both users and



limiting both to only four additional PCs. In effect, the PC is now double-licensed.

Neither is beneficial. Furthermore, such sharing could be dangerous. For example, if the first user does not log off and the second user creates a document to be stored on OneDrive, documents will be stored in the first user's OneDrive, not the author's OneDrive. The author would be unable to retrieve the document from any other PC without the original user's permission.

Reference Documents

TechNet Articles on Office365 ProPlus deployment

Deployment methods for Office 2013

https://technet.microsoft.com/en-us/library/ee624360.aspx

Deploy Office 365 ProPlus as part of an operating system image

https://technet.microsoft.com/en-us/library/dn314789.aspx

Overview of Click-to-Run

https://technet.microsoft.com/en-us/library/jj219427.aspx

Deploy Click-to-Run for Office 365 products by using the Office Deployment Tool

https://technet.microsoft.com/en-us/library/jj219423.aspx

Reference for Click-to-Run configuration.xml file

https://technet.microsoft.com/en-us/library/jj219426.aspx

Choose the Office software that users can install from the Office 365 portal

https://technet.microsoft.com/en-us/library/jj219421.aspx

Determine the deployment method to use for Office 365 ProPlus

https://technet.microsoft.com/en-us/library/gg998766.aspx

Overview of licensing and activation in Office 365 ProPlus

https://technet.microsoft.com/en-us/library/gg982959.aspx

Overview of shared computer activation for Office 365 ProPlus

https://technet.microsoft.com/en-us/library/dn782860.aspx

Online Services Terms for Office 365 Applications

Installation and Use Rights

Each user to whom Customer assigns a User SL must have a Microsoft Account in order to use the software provided with the subscription. These users:

- may activate the software provided with the SL on up to five concurrent OSEs for local or remote use;
- may also install the software, with shared computer activation, on a network server or Microsoft Azure Platform Services and use the software to create, edit, or save documents. For the purpose of this use right "network server" means a physical hardware server solely dedicated to Customer use. This shared computer activation provision does not apply to Customers license for Office 365 Business; and
- must connect each device upon which user has installed the software to the Internet at least once every 30 days or the functionality of the software may be affected.



The following terms apply only to Office 365 Business and Office 365 ProPlus

Smartphone and Tablet Devices

Each user to whom Customer assigns a User SL may also activate Microsoft Office Mobile software to create, edit, or save documents on up to five of user's smartphones and five of user's tablets.

The following terms apply only to Office 365 ProPlus

Office Home & Student 2013 RT Commercial Use

Each User SL for Office 365 ProPlus modifies the user's right to use the software under a separately acquired Office Home & Student 2013 RT license by waiving the prohibition against commercial use. Except for this allowance for commercial use of the software, all use is subject to the terms and use rights provided with the Office Home & Student 2013 RT License.

Office Web Apps Server 2013

Each Office 365 ProPlus user may use the Office Web Apps Server 2013 software. This provision does not apply to Customers that license this Product under the Microsoft Online Subscription Agreement or other Microsoft agreement that cover Online Services only.

Subscription License Suites

In addition to Office 365 ProPlus User SLs, Customer may fulfill the SL requirement for this Product by purchasing a Suite SL (refer Attachment 2).

Product Use Rights, Jan. 2015

Selected Definitions

External Users means users that are not either your or your Affiliates' employees, or your or your affiliates' on-site contractors or on-site agents.

Licensed User means the single person to whom a license is assigned.

Selected Universal Terms

License Reassignment

Most, but not all, licenses may be reassigned from one device or user to another. The general rules governing license reassignment are described below, along with some special rules for certain products and license types.

LIMITATIONS ON LICENSE REASSIGNMENT

Except as permitted below, you may not reassign licenses on a short-term basis (within 90 days of the last assignment), nor may you reassign licenses for Rental Rights, or Software Assurance separately from the underlying license to which the Software Assurance is attached. CONDITION ON LICENSE REASSIGNMENT

When you reassign a license from one device or user to another, you must remove the software or block access from the former device or from the former user's device.

Subscription Licenses for the Windows desktop operating system. You may reassign your Windows (VDA) subscription
licenses and Software Assurance for the Windows desktop operating system User SLs, subject to the general limitation
against short-term reassignment and assignment rules stated in the Product List.

Enterprise Agreement Enrollment

- 2. Order requirements.
- a. Minimum order requirements. Enrolled Affiliate's Enterprise must have a minimum of 250 Qualified Users or Qualified Devices. The initial order must include at least 250 Licenses in a single Product pool for Enterprise Products or Enterprise Online Services.
 (i) Enterprise Commitment. If ordering any Enterprise Products, Enrolled Affiliate's order must include coverage for all Qualified Users and/or all Qualified Devices in any Product pool an Enterprise Product is ordered in. Enrolled Affiliate may elect to mix Enterprise Products and the corresponding Enterprise Online Services within a Product pool as long as all devices not covered by an Enterprise Product are only used by users covered with a per user license.

