DeployExpert™

ROI Calculator
User Guide

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deployexpert DX™

Hardware Independent Deployment Automation

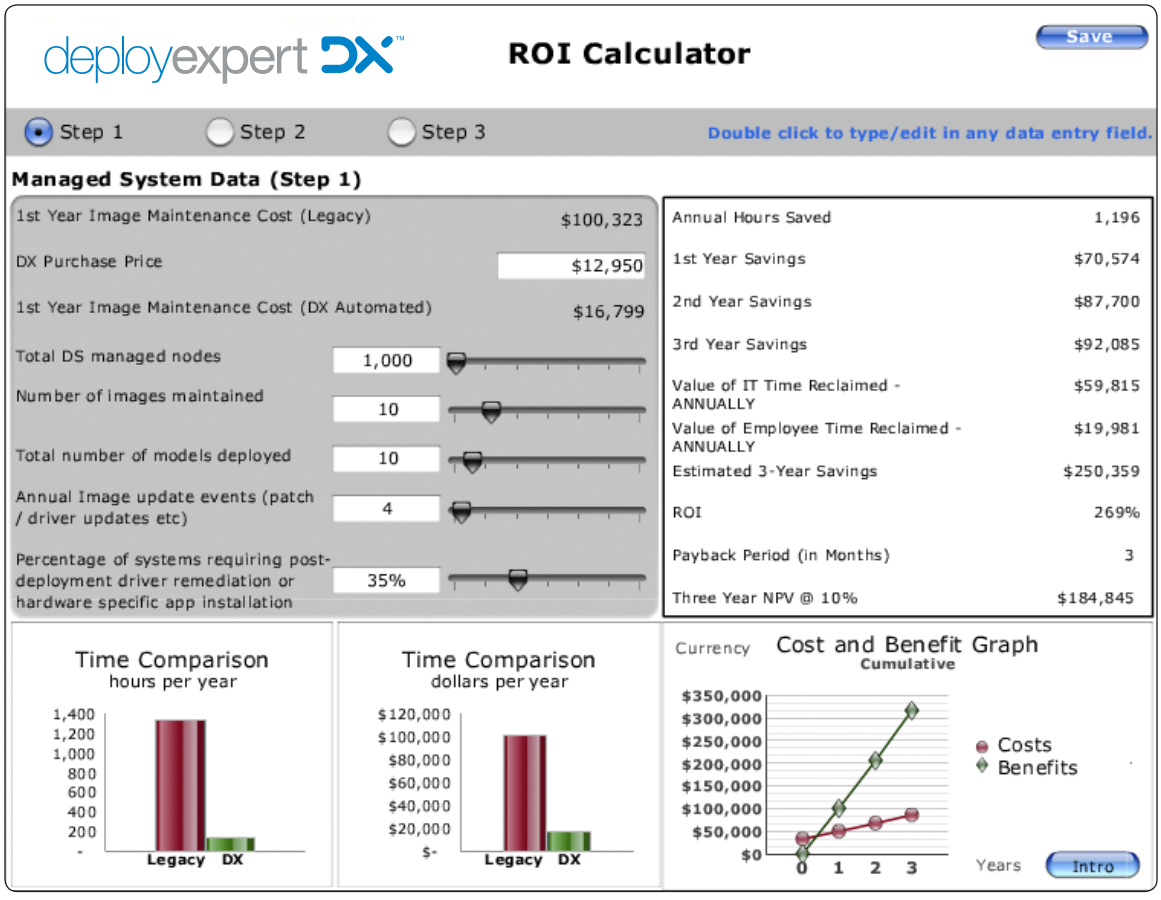
Powered by Altrinsic Solutions™

Introduction

The DX ROI calculator is a analytic tool that attempts to estimate the financial return on investment (herein “ROI”) achieved by adding DeployExpert to a given IT enterprise environment. The tool is used by feeding in data regarding the enterprise environment into three successive data sheets which are accessed by clicking the radio buttons indicated by the red arrows in the illustration below.

Although Altrinsic Solutions has made every attempt to accurately and conservatively estimate the “hard costs” associated with relevant deployment endeavors, the resulting financial numbers are estimates and may be either high or low estimates depending on environmental specifics not accounted for by the calculator.

That said, because DX is a software automation of activities that otherwise tie up significant time from an IT department’s senior engineering staff, ROI results are typically significantly under a year for payback.



Methodology

The ROI calculator uses input values to calculate the costs associated with the number of average annual deployments, image process engineering time, image creation time, post-deployment system remediation time and image update time associated with Hardware Independent Deployment ("HID") activities.

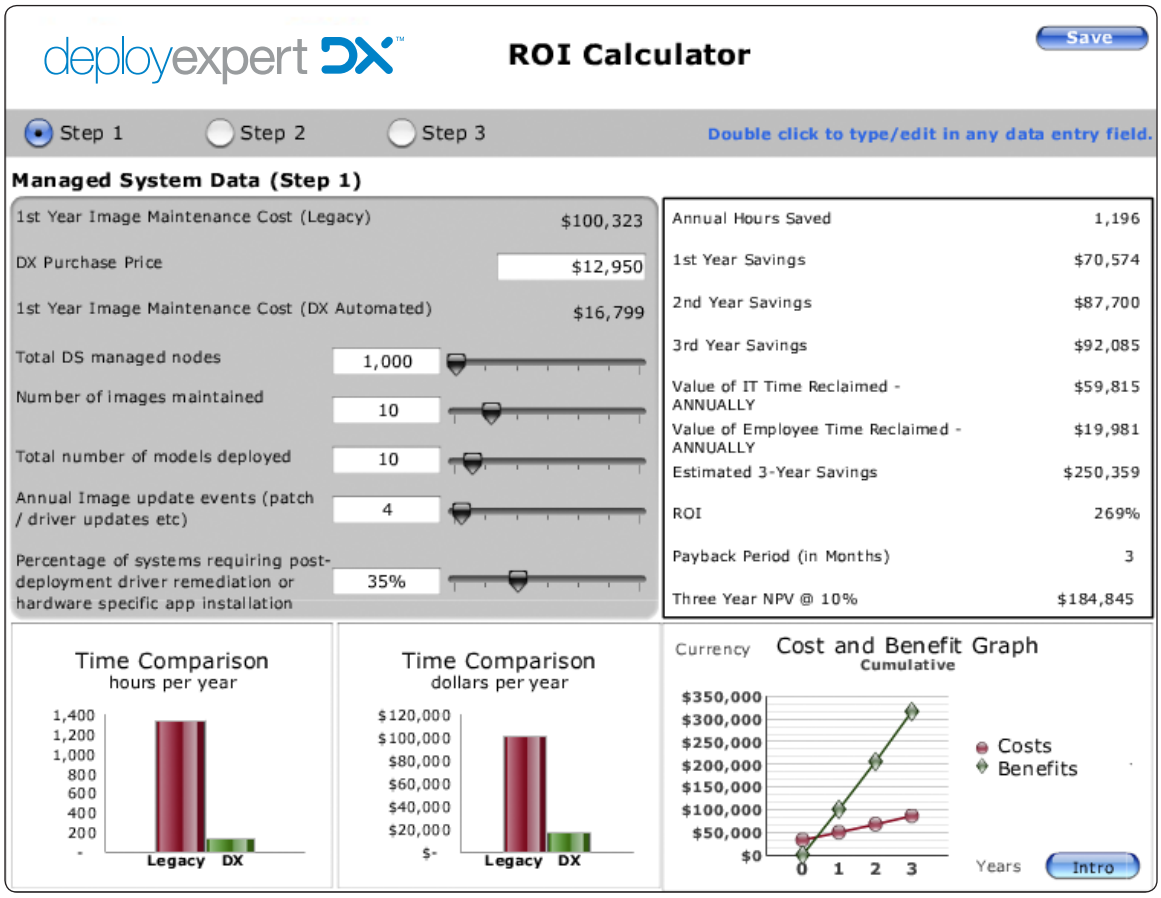
The DX ROI calculator accepts the following input values:

Note: *To enter data, DOUBLE-CLICK on the fields or use the slider functionality.*

Step 1 - Managed System Data entry sheet

- **DX Purchase Price** - Enter your total DX-associated component of quote amount. If you do not have a quote, as of April 2010, the single, no discount per client node price for DX was $12.95 US. This price may go up and does not include optional purchases such as Automated Upgrade Protection or Professional Services integration consulting assistance. Contact your DX reseller for a price quote for DX for servers.

- **Total managed nodes** – This is used by the ROI as part of the base number to calculate the average number of annual deployment events



- **Total number of images maintained** – This is how many images it does, or would take to be able to image any hardware platform in the enterprise. Don't forget that if your HID process covers multiple OS's (e.g. Windows XP, Windows 2000, Windows 2003 Server, Windows 2008, 32 bit versus 64bit versions etc…) you must minimally have one image per OS's that are relevant in the HID process.

- **Total number of models deployed** – Although the number of actual hardware platforms is often significantly higher than the number of models (keep in mind that systems of the same model may have vastly different internal OEM and add-on components and thus drivers), this number is used to visually identify whether or not there is any Hardware Independent imaging currently fielded. This would be signified if the number of images < number of models. This number is not used in any financial calculations.

  Imaging maintenance numbers are a function of the stated number of images, standards for process setup and number of annual image update events.

- **Annual Image Update Events** – How many time per year do you (more importantly would you "like") to be able to update your image. Corporate norms are quarterly or "4".

- **Percentage of Systems Requiring Post Deployment Driver Remediation or Hardware Specific App Installation** – Does your imaging process take into account peripherals like add-in expansion cards, printers, USB Cameras, CAD digitizing tablets and the myriad of other peripheral devices required to re-deploy a "system" or does it just handle core common model activities?

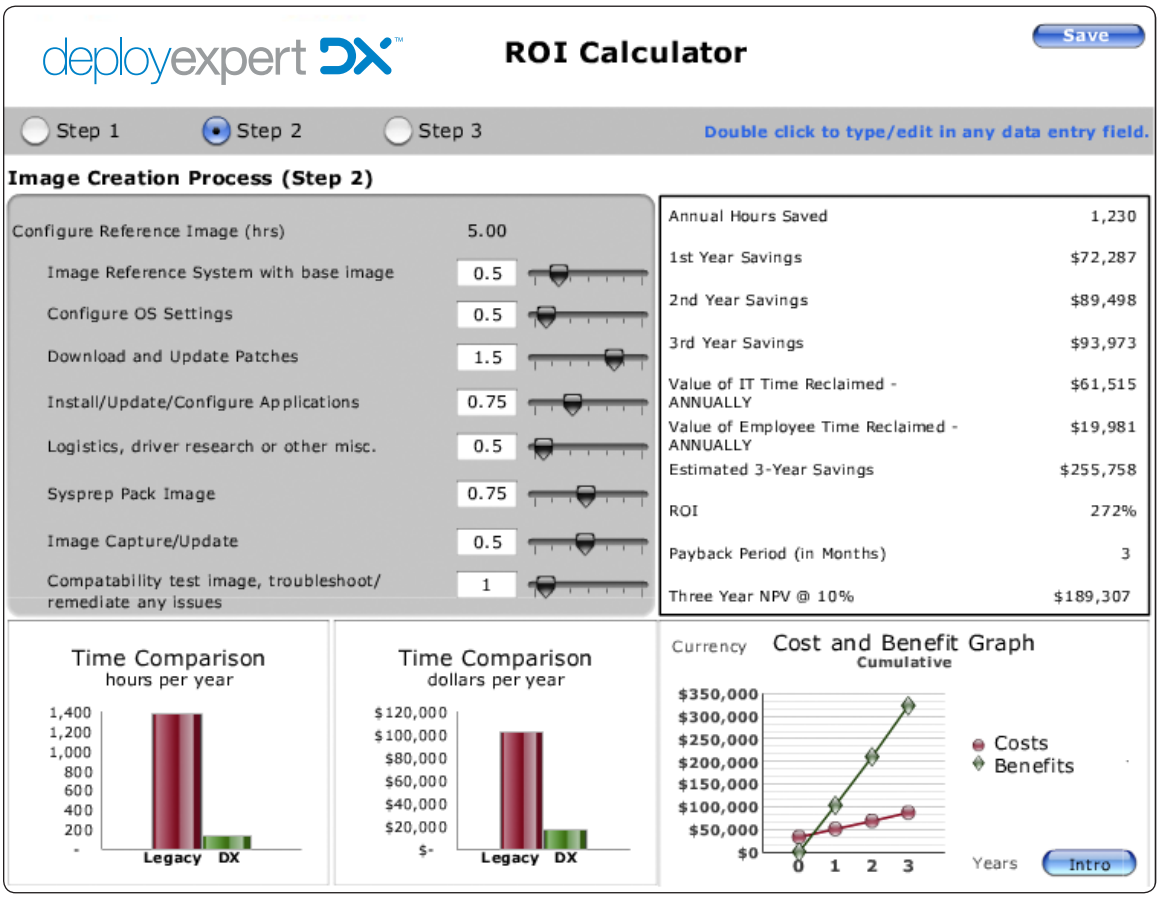
  Without DX most organizations find it impractical to handle peripherals in their HID endeavors. From our sampling, we find that most organizations surveyed feel that between 15-40% of systems deployed are remediated for peripheral drivers and or hardware specific apps (e.g. those apps associated with things like tablet PC hardware, USB biometric fingerprint add-on peripherals etc…).

  In keeping with being conservative on our estimates, the time associated remediation is estimated at the (presumably) lower, fully burdened Worker time rather than the (normally) more expensive, IT worker time. Although it certainly exists, other than the time itself, this ROI tool doesn't try to add any business impact due to downtime.

(continued)

Step 2 - "Image Creation Process" data entry sheet

Note: *Our research has shown that extemporaneous estimates of these activities often fall far short of the* ***actual timed values*** *associated with performing "Image Creation Process" activities. Keep in mind, all associated prerequisite steps associated with the following variables conduct a timed test to get actual values.*



- **Install / Image down OS** – Factors into time building your template image system. Most organizations have a starter image that they image down and prepare using Sysprep or other tools. The default .5 0 simply represents one half hour or thirty minutes. This and all the following values roll up to the Configure Template System time (default 6 hours) which is used with the fully burdened IT worker time to put a value on rebuilding an image.

- **Configure OS Settings** – Those activities associated with setting up explorer, corporate settings, wallpaper and the myriad of other items (default 30 minutes).

- **Install Initial Patches** – Default 1.5 hours, can be much less, or more, depending on download times, research, testing etc. It is common knowledge that Microsoft and other application vendor patches can "break" windows or other application functionality and given that issue, many organizations prefer to validate basic windows component and application functionality prior to reproducing the image on numerous deployed systems. Our team's estimation of 1.5 hours to both patch and perform validation testing was conservative to low.

- **Install Applications** – Default 45 minutes. Installation of antivirus, firewall, productivity, management agent and other applications required on all systems to be deployed with this image.

- **Misc software configuration** – Default 30 minutes. Configuration of applications or other items related to the image.

- **Pre-image mass distribution packing** – Default 45 minutes. All activities associated with Sysprep packing or other activities necessary to handle SID, mass-storage drivers or other items that must be performed to provide for mass distribution of the image.

- **Misc computer hardware logistics** – Default 30 minutes. Finding a preferable image target system (typically a single processor system with a uniproc HAL) and getting it online and ready to accept the template image configuration.

- **Image Compatibility Testing with other platforms** – If any level of HID process support is implemented, images should be compatibility tested with the platforms that they serve. Again, the number of hardware platforms is typically far in excess of the number of actual models deployed, but, in the spirit of providing conservative estimates, we give the manual process the benefit of the doubt.

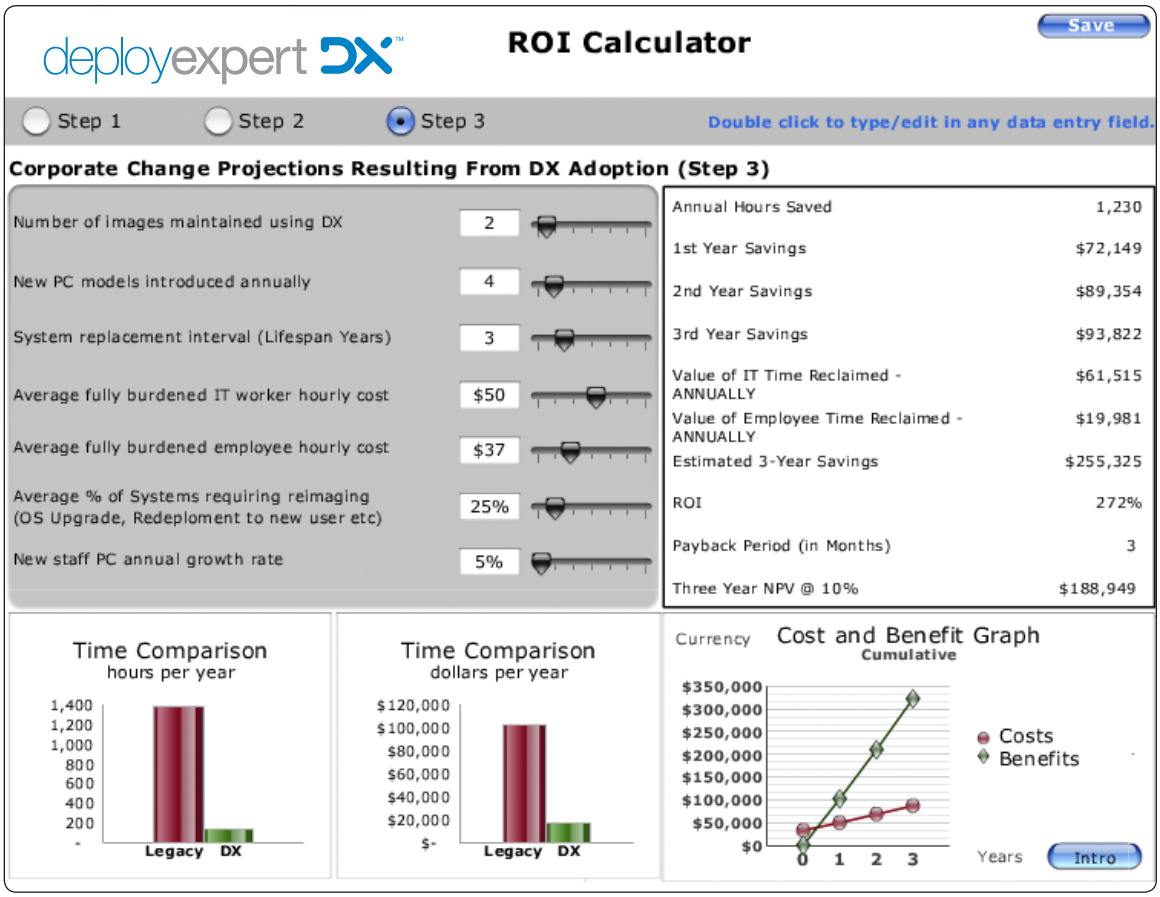
Step 3 - "Corporate Change Projections Resulting From DX Adoption" data entry sheet

- **Number of images maintained using DX** – This can be 1, but only if there is only a single OS in play. Often, single OS images are split for other than HID reasons (e.g. content).

- **New PC Models Introduced Annually** – This helps indicate how many new platforms are introduced annually and that that will trigger a process update cycle to support the new platforms. We estimate 3.5 hours average per new platform although corporate norms are more like 16 hours to take a completely new model and integrate it in a HID process. Again, benefit of the doubt to the advantage of the manual process.

- **System Replacement Interval (Lifespan Years)** – This value is used to help calculate the average number of annual deployments. If you have 1000 managed nodes and your system lifespan is 4 years, then there is a built-in average of 25% of your managed systems (or 250 deployment events) per year.

- **Average fully burdened IT worker hourly cost** – All direct and indirect costs associated with a senior IT engineer such as supports HID activities in the environment. Typically this is above $70/hr in metro areas, but we have defaulted it to $50. Set this as appropriate for your environment. This rate is used to financially value labor invested in HID.



- **Average fully burdened employee hourly cost** - All direct and indirect costs associated with an average employee environment. Typically this is above $40/hr in metro areas, but we have defaulted it to $37. Set this as appropriate for your environment. This rate is used to financially value labor invested in remediation system deployment that do not provide for all drivers required by the system and its peripherals.

- **Average % of systems requiring re-imaging (OS Upgrade, Redeployment to a new user etc)** – This number is often higher than one would think. Consider that in addition to any re-deploying a system to re-issue it to another user, “tech refreshes” (re-imaging a system to restore it to a functioning software state in response to a system issue such as malware infection), that if your serviced enterprise migrates to a new OS every six years, you have a built in 17% building re-image base.

  Due to these and other re-image trigger events, the number of systems that are re-imaged on an annual average basis is often 25-35%. We use the lower of those two values as a default.

- **New Staff PC Annual Growth Rate** – This value helps estimate the growth of your enterprise and adds to the average number of annual deployment events. In most enterprises, new PC’s are imaged with a corporate standard image prior to being deployed (whether by the corporate IT staff or as a fee based service from the PC OEM); this ROI calculator assumes this model.

Financial Results

Results are presented in the right-side information pane, and are summarized as follows:

- **Annual Hours Saved** – the totals of the process engineering, image preparation and remediation process hours saved by using DX.
- **1St Year Savings** – Savings less the cost of the DX platform entered in step 1.
- **2nd Year Savings** – Continued saving taking into account growth (if any) specified in growth rate.
- **3rd Year Savings** – Continued saving taking into account growth (if any) specified in growth rate.
- **Value of IT Time Reclaimed Annually** – Tallies the value of the saved IT hours at the fully burdened IT rate.
- **Value of Employee Time Reclaimed Annually** - Tallies the value of the saved Employee hours at the fully burdened Employee rate.
- **Estimated 3-Year Savings** – Total of all 3 year saving amounts.
- **Payback period (in Months)** – Estimated number of months required to obtain a ROI on the cost of DX.
- **3-Year NPV @10%** - If you invested the monies required to obtain and implement DX at 10% APR, this amount shows the financial advantage to the organization over and above that return.