Fine Art Printing for Photographers

Exhibition Quality Prints with Inkjet Printers

2nd Revised Edition

Uwe Steinmueller • Juergen Gulbins
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Uwe Steinmueller · Juergen Gubins
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Preface

A brief history
Inkjet printers have been around for more than 20 years, yet digital inkjet printing technology has only come of age in the past few years. The earliest consumer models lacked the technology and sophistication to print photographs similar in quality to common silver-halogenid prints (stereotypical photos printed on photographic paper), developed from film negatives or slides. Worse, inkjet prints lacked the lightfastness of silver-halogenid prints. For most users, the digital inkjet printers that delivered the desired image quality, e.g. Iris prints, were, unfortunately, rarely affordable. This economic obstacle has changed dramatically in the last few years, with the rise of digital photography. Thus, there is now a sizeable market for a new breed of inkjet printers from seasoned manufacturers like Epson, HP, Canon, Lexmark and Dell, among other newer brands.

Among the first Super B printers, suitable for both fine art printing and the budget of a broad range of buyers, were the Epson P2000 and P2200 (P2100 in Europe). The breakthrough of this line was based on quality, affordable price, and an Ultrachrome ink set.

Size matters
Many photographs impress viewers only when presented at an optimum viewing size; for example, the typical pocket-size 4 x 6 format is clearly unsuitable as a pleasing means of displaying a beautiful print. For most good shots, even the larger Letter, Legal and A4 sizes often leave viewers wanting more. Enter the A3+/Super B prints, which measure an impressive 13 x 19 inches. In 2005, there was an explosion in the use of these medium- and large-format prints, an impressive statistic that further in 2006 and 2007 (and beyond) increased when a number of new fine art printers were introduced by HP, Canon, and Epson.
For some photographs, it is advisable to produce even larger prints. Printer manufacturers like Epson, HP and Canon market printers that promise high-quality prints up to 64 inches wide. There are many other large-format printer manufacturers out there, like Encad, Oce, Mutoh, and Roland, yet they are not designed for true, fine art printing. For this reason, we chose to focus on the moderately sized prints and printers, typically from Letter/ A4 to C/A2. Most of the lessons of fine art printing, however, can be applied to both smaller and larger prints and printers.

**Fine Art Printing is a Sensuous Endeavor**

The highly technical nature of fine art printing should not overshadow its ability to awaken the senses. As the term “fine art printing” expresses, it is the printing of art in a highly artistic fashion. It allows you to project onto paper an image created with a simple digital or film camera, after enhancing the image with image-manipulation software to more accurately represent the original. Today’s fine art printing, using a good digital inkjet printer, allows you to produce a quality of equal or higher value than that of traditional silver-halogenid prints, and clearly surpasses the quality of offset or rotogravure printing. When performed optimally, your printing can achieve a richer color gamut and finer tonal gradations than with traditional book- and magazine-printing techniques.

**Experiment … and Discover!**

As with other genres of art, without proper knowledge and practical experience, the resulting print may not be as accurate as the image on your computer monitor, so you may have to try several different techniques, papers, paper sizes, borders, and matte styles. With careful practice, you will hopefully be on your way to producing museum-quality work with less effort than you had previously dreamed.

Though most prints are either displayed in frames behind glass or Plexiglas, often to reduce glare, this has the effect of reducing the visual appeal of the print and the fine art paper on which it is printed. Therefore, it is important to experiment with different types of fine art paper to achieve the desired result. Paper with a certain texture and tactile essence can be very sensuous indeed, so take your time to find the paper that best suits your taste and needs and to achieve the result you like.

A printing paper’s color, surface, texture, and gloss will determine the kind of print you will produce, and must be carefully chosen to match the feeling you wish to project. An architectural shot may require a different printing paper than a photograph of nature or a landscape. A black-and-white print calls for a certain type of paper that would be unsuitable to a full-color shot. A certain print displayed without glass or Plexiglas will appear entirely different than one framed behind these types of transparent coverings.
Both authors use digital cameras – Uwe Steinmueller as a professional and Juergen Gulbins as a serious amateur. They were both led to fine art printing by the desire to control their workflow from start to finish, from the shooting of photos to the finished print. Printing with a fine art printer for them, is not a simple, tiresome task, but the final step, and a very important one – toward producing a pleasing image.

Planning for printing and printing itself takes time, but, in most cases, only a perfect, finished print gives full value to a good shot. Normally, only a few of all the photos you take will make it into a perfect, fine art print, but in many cases, this print will be the crowning glory of your photographic shooting. With the techniques shown in this book (together with others books we have published), you should be in complete control from start to finish.

We hope that the control of this process and the creative tasks along the way give you the same satisfaction and relaxation we found while doing it. Producing a satisfying print from your work has similarities to Christmas: the work is finished, and the present is unwrapped. You must still find a place to keep or present it, a place where it can be enjoyed for years to come.

**Acknowledgements**
Thanks to our many influencers and friends like Bill Atkinson, Jim Collum, Charles Cramer, Brad Hinkel, Mac Holbert, and Ben Willmore.

Uwe Steinmueller, San José (California)  
Juergen Gulbins, Keltern (Germany)
Foreword by Mac Holbert (Nash Editions)

In 1989 my partner, Graham Nash, and I embarked on a search for a way to save a large body of his photographic work. The original negatives had been lost while being shipped from Los Angeles to Graham’s home in San Francisco. All that was left was a box of “jumbo” contact sheets. Graham had been offered a show at the Parco Galleries in Tokyo and without his negatives he was unable to put together an exhibit. In solving the “problem” we ended up creating a method and a studio that has been recognized by many as the first fine art digital photography studio in the world. With the help of our friends, David Coons and Charles Wehrenberg, Jack Duganne and I experimented with hardware and software and by 1991 had developed a product that we felt was ready for the world. As it turned out we still had much to learn.

The only source of information in those days was from the few individuals that were involved in the technology. When I opened the door to Nash Editions in July of 1991, I had basic working knowledge of word processing and database management but I didn’t have a clue what the difference was between a pixel and a raster. I asked a lot of questions, nurtured a lot of friendships and slowly I began to develop an overview of image processing and image output. By the mid 1990’s the Internet had become an excellent source of information exchange and I began to frequent the online forums that focused on imaging and printing. I can’t remember specifically when I first saw the name Uwe Steinmueller but I believe it was either 2000 or 2001. Suddenly I noticed his name appearing everywhere. Not only was he in quest of information but he was, more importantly, sharing it with anyone and everyone who would listen.

I finally got to meet Uwe in 2003 when he and his wife Bettina visited my studio. Their enthusiasm for the digital photography revolution was obvious. I have seen many “experts” come and go over the past 16 years. Uwe’s expertise and his openness have gained him a high level of respect and admiration in the evolving world of digital photography.

I am very impressed with the book you are about to read. It’s information like this that has helped to raise the quality of digital output and reduce the traditional art world’s resistance to the use of digital tools in art. It is a book written by someone who KNOWS fine art digital printmaking. Uwe’s style is concise and to the point. This comprehensive and complete guide to fine art digital printmaking should be included in the library of anyone who is serious about making fine art digital prints.

I only wish that all this excellent information had been available to me back in 1989 when I embarked on my digital journey. The hours I wasted … The ink and paper I wasted … The late nights … The cold suppers …

Mac Holbert

April 2006
What’s New in the Second Edition?

This is the second edition of this book. Since the first edition in 2006 quite a few new printers suitable for fine art prints were introduced by HP, Epson and Canon, some of them outdating printers that we mentioned in the first edition. We try to cover these new printers in this book. Quite a few new fine art papers have hit them market, and we will cover these too in the current edition. We have also found some effective good ways to determine teh amount of brighteners that are used in specific papers, so we will give you some hints on this subject as well.

New printers and papers will continue to come up. To facilitate the update in these, we slightly changed the scheme of the book. The actual practical printing that is described in chapter 5 now merely serves as an example. We off-loaded details on specific printers to appendix A, where you will find a section for each specific printer or printer line. Additionally, you will find updates on these printers on Uwe's Internet site as soon as we are able to lay hands on new printer models and we have had the opportunity to test new papers. So, for updates, have a glance at that site from time to time at: www.outbackprint.com

New functions have appeared in applications described in our first edition; also new applications and filters have come to the market, which are described in this second edition. Some of the dialogs of Photoshop where updated when Photoshop CS3 was introduced. As the minor changes of the interface were not relevant for our task here, we did not update all screenshots – please accepts our apologies for this.

As we both work on Mac OS X as well as Windows, you will find screenshots from both platforms. As the interface and the handling of Photoshop and most other applications are almost identical on both platforms, this should not confuse you. When using keyboard shortcuts, in most cases we will specify both versions – where not, simply substitute the Windows Ctrl key by the Mac ⌘ key and the Windows Alt key by the ⌥ key when working with Mac OS X (and vice versa). ⌘ stands for the Shift key. ⌘-Ctrl-Alt implies, that you have to press all these keys simultaneously.

This revised reprint of the 2nd edition includes all the latest changes in Photoshop CS4 and CS5, and also covers printer models introduced in 2009 and 2010. Once again, we haven’t renewed all of the screenshots to reflect the slightly changed Photoshop GUI, as the relevant settings and menu entries remain the same.
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