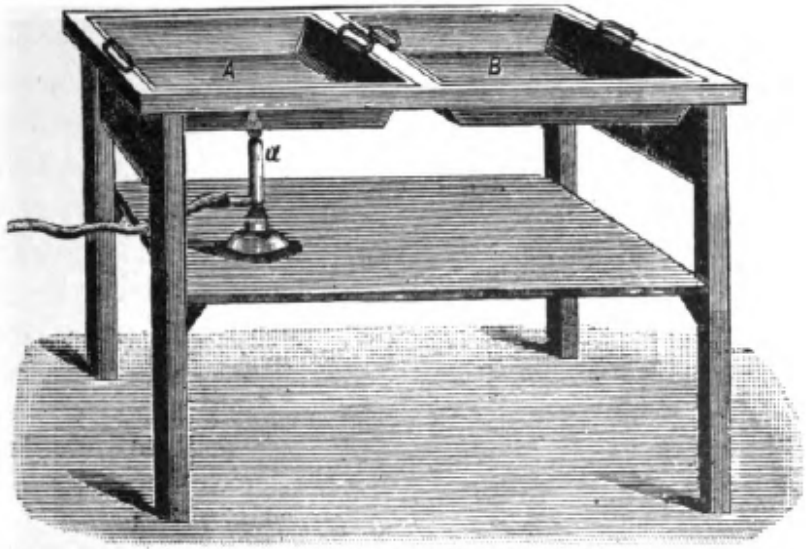

ARRANGEMENT OF DEVELOPING TRAYS.

2

Getting Started

How to Use this Book, be Safe, and Avoid Common Pitfalls

If you are a veteran carbon printer, you should feel comfortable jumping around this book to topics of special interest. For new carbon printers, there is a path through the working procedures that will be the most helpful in getting you to your first prints. Below is some advice on how to use this book as well as some recommendations for new carbon printers that should help you avoid common pitfalls.

How to Use this Book

As a comprehensive working guide to carbon transfer, this book aims to provide the beginning carbon printer with a clear understanding of the fundamentals and a straightforward path to success, and to document variations and special techniques that are of interest to more experienced printers. Accordingly, keep a few things in mind when using this book:

1. If you are new to carbon printing, read the recommendations for beginning carbon printers below and the Process Overview chapter first. Then review the chapter on Equipment, Materials, and Supplies. Once you have read these sections, you should be able to move to the chapter on Materials Manufacture with enough knowledge to start making some decisions about making tissue and preparing final supports. It's also worth reviewing the chapter on single transfer to get a look at how you will be using the equipment you will need.
2. This book presents single transfer printing as the basic carbon transfer process followed by double transfer, carbro and color carbon as variations that build upon the single transfer workflow. New carbon printers should work through the single transfer process even if your eventual goal is double transfer or another more advanced technique.
3. The sections on materials, equipment, and supplies are designed to help you plan everything you need for single transfer. Special supplies and equipment for double transfer, carbro, and color printing are covered in their respective chapters.

For Beginning Carbon Printers

Throughout this book we present a variety of options for printing tissue, final supports, tools, and processes. For the beginning printer, navigating these choices can be difficult for lack of experience. Even more importantly, they can introduce unexpected variables that make successful printing and troubleshooting problems difficult. Much of the success in printing and in troubleshooting failures is based on the ability to limit the number of variables and points of failure. With that in mind, here are a few recommendations for beginning carbon printers. In the beginning, simplicity is key.

1. Start out making single transfer prints even if you eventually intend to make double transfer. You'll master the core skills more easily and most everything you learn will apply to your double transfer work. The skills for double transfer will be much easier to learn once you have a solid foundation in single transfer.
2. You can buy ready made tissue from Bostick and Sullivan (see the appendix on suppliers). However, don't be intimidated by making your own tissue. We highly recommend that you start out with homemade tissue. Bostick and Sullivan tissue is much thinner and performs differently. Prints will show much less relief and soak times for mating tissue and support are much shorter. Making your own tissue is easier than you think, you will want to do it if you have more than a passing interest in carbon, and you will feel more mastery of the craft.
3. For making tissue, start out with a standard formula for pigmented gelatin and pigment as shown in the chapter on manufacturing materials. It's simple and less likely to introduce unexpected problems. The properties of pigments, in particular, can vary widely and introduce unexpected problems that are difficult to troubleshoot when you first start out. Used as a pigment, India Ink, without added shellac, will give you a true carbon black image with deep intense blacks and it mixes well and disperses easily.
4. The standard gelatin and sugar concentrations work well for most environments. Avoid adding extra ingredients to your pigmented gelatin until you have a known reason to do so. Perfect prints can be made with pigmented gelatin that contains just gelatin, sugar,

water, and pigment. Adding extra ingredients from the start will only complicate the process and make troubleshooting more difficult.

The Propylaia to the Acropolis, Athens. Braun, Clément & Cie (French, 1889 - 1910). negative 1869; print about 1890. Carbon print.

5. Avoid using gelatin coated art paper as your first final support. Start out using "fixed out" photo paper or a synthetic support such as Yupo. Art paper can be very temperamental and its behavior can vary widely based on the specifics of how you coat the paper and harden the sizing. Fixed out photo paper, on the other hand, is very consistent and reliable and is much less prone to common problems such as frilling and blistering. Every printer should at least try photo papers for their aesthetic qualities as they show very pronounced relief, particularly glossy papers. Even experienced printers who prefer to print on art paper will keep photo papers on hand for troubleshooting. When troubleshooting problems, you will hear experienced printers ask each other, "Have you tried printing it on photo paper?"

By following these recommendations when you begin printing, you can keep the number of variables at a minimum and when you do have problems they'll be easier to diagnose. In addition, it's the best way to keep your process as simple as possible and make printing easier in the long run.

Safety

While all materials used in photography and printmaking should be handled with caution, most of the materials and ingredients used in carbon printing are not hazardous. The most common exceptions are dichromate used to sensitize carbon printing tissue and formalin used to harden gelatin sizing.

These compounds, like all chromium(VI) compounds, are highly toxic and potentially fatal if ingested or inhaled. They are also known carcinogens and strong irritants. When mixing dichromate solutions from powders, great care should be taken to avoid inhalation of dichromate dust. When handing powders or mixed dichromate solutions, gloves should be worn to avoid direct contact with the skin. Wearing of gloves should also be practiced when mating tissue and supports and during development when dichromate will dissolve into the water in mating and development trays. Most of all, great care should be taken avoid any ingestion of dichromate. Dichromate solutions should be used

away from food or any area when they may accidentally be ingested. Containers of dichromate solutions should always be clearly labeled as poison. The orange color of dichromate solutions makes minor spills and stray drops easy to spot, but also makes the solutions resemble an orange beverage. For more information, see Appendix B on the safe and responsible use of dichromates.

Formalin, which is often used for hardening the sizing on single transfer supports, emits fumes which are toxic and can be highly irritating. We recommend that solutions that contain formalin only be used outside or in very well ventilated environments. The same apples to drying materials that contain formalin.