

Art  
ToGo

The Cleveland  
Museum of Art

Cool Knights:  
Armor from  
the European  
Middle Ages  
and Renaissance

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## Also in your folder

- a. Presentation Evaluation**  
After the presentation, please fill out the evaluation and return it to the museum. Thank you!
- b. Fax Sheet**  
Already addressed to the proper department of the CMA, this form is for shorter questions or concerns relating to the Art To Go program.
- c. Art Project**  
*Make Your Own Helmet!*  
Created by Bob Dewey  
A model for a class art project using simple materials

## Introduction

The purpose of this Teacher Preview packet is to prepare you for a visit from the Art To Go program of the Cleveland Museum of Art. The materials included inside should help you become familiar with the Art To Go program and with the topic of the presentation you have requested, arms and armor from the European Middle Ages and Renaissance. Please use the materials, and feel free to share them with your colleagues. You may freely reproduce the materials in the packet for educational purposes.

## At a Glance

The Armor Suitcase contains seven pieces of armor and a single crossbow bolt, eight pieces in all. These objects come from the European Middle Ages and Renaissance—most are from the 16th century—and, for the most part, represent the kinds of armor worn by knights in those periods. The Art To Go presentation looks at these objects in terms of the technological development and the artistry of armor. The Art To Go presentation also addresses some of the popular misconceptions of armor, for example, that a suit of armor was heavy or difficult to wear. The Armor Suitcase includes an armored gauntlet that students can actually try on for first-hand experience of wearing armor.

## Why Armor? and Is It Art?

At first the arms and armor of the European Middle Ages and Renaissance may seem simply the remains of long-ago battles, wars fought in far-off lands, with little significance to modern viewers. But the arms and armors of old Europe are more than just curiosities. They are artifacts and works of art that, because of their durable nature and the care with which they were kept, have survived the ravages of time. Armor tells us about history. It makes history come alive. Most suits of armor were made for specific individuals – knights, kings, and emperors. Now, hundreds of years later, these same suits help us reach back through the years, across oceans, and almost touch these kings and princes from history.

Armor also helps us to appreciate the ability of medieval and Renaissance artists and craftsmen. Each suit of armor is a technological marvel—made of perhaps hundreds of steel plates, joined together with straps, buckles, hooks, and rivets, all constructed to fit perfectly on a single individual and offer both complete protection and complete freedom of movement. Just as modern technology develops, the technology of armor developed. Changes in the forms and capabilities of armor shaped European history. Similarly, armor developed technologically in response to historical events. These masterpieces of craftsmanship and technology are, by their very nature, easily portable, so they can be made

available for first-hand viewing by scholars and students in American museums and schools.

Surviving examples of early medieval arms and armor are essentially artifacts of war. They were first and foremost functional. With the passage of time, as armor developed in response to changes on the battlefield and developments in weaponry, it also evolved into an artistic production. Armor always retained its functional aspect. It had to be well made, so that it moved fluidly with its wearer. At the same time, armor became increasingly a means of personal and artistic expression. The Renaissance prince in his etched and gilded parade armor was nobility personified. His armor held significance beyond its function and spoke not only of his military prowess, but also of his character and his own personal aesthetic in presenting himself.

Armor also holds an interesting place in our own field of knowledge. Nearly everyone knows at least something about medieval and Renaissance armor, has some concept of how it looks and what it was for. Yet popular modern ideas of armor are often incorrect. The familiar concept of the medieval knight in shining armor is an anachronism. The knight in shining armor belongs to the Renaissance period, while the medieval knight was well equipped in a coat of mail. Popular belief holds that armor is, or should be, extremely heavy and difficult to wear and move, yet most armor is relatively light and extremely flexible. Another widespread myth uses the relatively small size of some suits of armor to sug-

gest that people, in general, were shorter in those days. It may be the case, however, that the shorter suits were made to fit younger men and boys who had not grown to their full height. Indeed, many of our modern misconceptions derive from 18th- or 19th-century romanticism, and have little to do with the reality of earlier periods. In going back to the source, studying the actual plates of a Renaissance suit or witnessing the fluidity of movement within an armored gauntlet, we can begin to clear any false ideas handed down to us and better understand people and events from an important time in European history.

## Questions and Answers

### **What is armor?**

Broadly speaking, armor is any kind of equipment that is worn or carried for protection. Different kinds of armor were used by different cultures throughout history and over the entire world. This program focuses on armor worn in Europe in the Middle Ages and Renaissance, from about 800 to around 1650. During this period, armor developed from mail, made of interlocking steel rings, to suits composed of overlapping steel plates. In the 17th century, as firearm technology advanced, armor became increasingly obsolete, and full suits of armor were generally not worn after about 1650.

### **Who wore armor?**

Ordinary soldiers in the Middle Ages and Renaissance often wore some rudimentary armor. A well-made coat of mail or, later, a fine suit of armor was the exclusive right of the nobility. Armor of high quality was extremely expensive, and none but the very rich could afford it. What is more, many of the finest suits are covered in beautiful decoration that would have added considerably to the cost. These highly decorated suits of armor were owned by the highest in rank – the dukes, kings, or emperors of the later Middle Ages and Renaissance.

### **What is a knight?**

A knight was a soldier, a well-trained warrior from the nobility who fought for his religion, or for his king or country, or for himself. In theory, a knight also lived by a strict code of behaviour. Under this code of *chivalry*, or knighthood, a knight was to honor his religion, his king, women, and those less fortunate than himself. The realities of life and war in Europe's Middle Ages and Renaissance were certainly not as pure as their literature would suggest, and chivalry is, in large part, a literary construction. Yet it does seem that noble soldiers were expected to observe a code of honor on and off the battlefield, and certainly many of them did try to distinguish themselves as true knights by living a life of chivalry.

## **Did they really wear those fancy suits of armor into battles?**

Not every suit of armor was made for battle, though many have cuts and scratches to show that they were actually worn in combat. Other suits were made for tournament games that could be just as dangerous as real warfare. Some of the heaviest, most protective suits, in fact, are the jousting harnesses worn in equestrian tournaments. Tournament armor can be quite decorative, but is still very functional. A suit covered in fine etching and shining with gold is still steel underneath, and still designed to protect against swords and lances. There were, however, other suits of armor, called “parade armor,” which were even more decorative and designed simply for show. Parade armor would probably not have been worn in combat, either in a real battle or in tournaments.

## **How much does a suit of armor weigh?**

Most people tend to think of armor as heavy, bulky, and very difficult to move around in. In reality, armor had to be relatively light and extremely flexible. No one would have worn armor into battle unless it gave its wearer an advantage on the battlefield. Too much weight and immobility are not advantages. A well made suit of armor may weigh around 60 pounds, distributed over the entire body. A knight in armor could move freely, run, get up after falling, mount and dismount his horse, all by himself. The plates in a suit of armor are actually rather thin and function not through mass or weight, but by deflecting a sword or arrow from angled surfaces.



## **Armor always looks so small... were people shorter back then?**

Some of the suits of armor that we see in museums look rather small. It only follows that the person who wore the suit was rather short. But this does not mean that every full grown male from 800 to 1700 was stunted. We know, for example, that Charlemagne (742–814) and Henry VIII of England (1491–1547) were both over six feet tall. Then why are so many suits of armor so small? It may be the case that the smaller suits of armor were made for younger men who had not yet grown to their full height. A future knight might have worn armor from an early age, for practice and to present a correct appearance in dress parades. As he outgrew one suit, he would need another, slightly larger. The smaller suits, made for boys as young as two years old, have child-like proportions and are easily recognizable. A suit for a 16-year-old, however, may have the proportions of an adult, but be deceptively short.

## Things to Think About

You may want to prepare your students with a few questions about armor. Here are a few sample questions that may pique their interest.

- If you were a king, or a duke, or maybe even an emperor, what kind of armor would you wear?  
What material would it be made of?  
What color would it be?
- How heavy is a suit of armor? Could you lift it over your head? Could you run in a suit of armor?  
Could you do a cartwheel in a suit of armor?
- How is a gauntlet like a lobster shell?
- Is a bolt of lightning anything like a crossbow bolt?
- Did women wear armor? Can you think of any women in history who did?
- Does anyone still use armor today?
- What kind of armor would you use to protect yourself against a shark's bite? Against a hockey puck?  
Against radioactive contamination?

## Talking Points\*

- Early in the Middle Ages (c. 800–c. 1500) soldiers wore mail armor into battle. Mail, composed of many thousands of linked steel rings, was flexible and relatively light and made very effective armor.
- In response to the development of mail-piercing weaponry, soldiers began to supplement their mail with plates of steel formed to fit various parts of the body. Eventually, plates were added to entirely cover the body. This new kind of armor, fully developed by the end of the 15th century, is what we usually think of as a suit of armor.
- A suit of armor is essentially clothing made of steel. As such, it must fit over the body and work with the body, rather than against it. For a suit of armor to function properly, it had to be finely crafted. A well made suit of armor is a technological wonder.
- Only a member of the nobility had the right to wear a fine suit of armor, and only a member of the nobility could afford such an expensive suit. In the later history of armor, knights often had their suits elaborately decorated, to show their noble status and their refined artistic taste.

\* An Art To Go presentation depends on personal interaction between a trained volunteer instructor and students in their own classroom. While the objects stay the same, presentations may vary greatly, depending on the instructor and the involvement of the students.

- Armor was worn into battle, but also used in tournaments and worn in parades. Suits of armor for tournaments and parades were often made differently from each other and from field armor. A knowledgeable eye can usually figure out the function of any given suit of armor.
- Is armor still used today? Where? Is it similar or different from the kind of armor that was used in the European Middle Ages and Renaissance? Why?

### List of Objects\*

- Fragment of mail. Date unknown.
- Quarrel (crossbow bolt). Germany or Austria, late 16th century.
- Breastplate. Germany or Austria, late 16th century.
- Vambrace. South Germany, 16th century with some 19th-century restorations.
- Gauntlet for the right hand. Germany, late 16th century with some 19th-century restorations.
- Close helmet. South Germany, about 1590, possibly with some 19th-century restorations.

At the discretion of the volunteer teacher and under the teacher's close supervision, all objects *except the close helmet* may be handled by students.

\* The Suitcase contents may vary, depending on the condition of the objects.

## Resources

### Lesson Plan

#### **The Focus**

Students will explore the Middle Ages and Renaissance through actual museum artifacts—the armor and weaponry of the medieval and Renaissance knight.

#### **The Purpose**

Studying technological and artistic developments in a specific historical period to help us better understand technology and art in a broad sense. Seeing and handling real artifacts from the Middle Ages and Renaissance can help us better understand a period and a warrior class that spark the interest of grade-school children even to the present day.

#### **The Motivation**

Introduce students to the material through engaging questions and answers, close observation of historical artifacts, discussion of artistic qualities, and direct handling of simple mechanical objects from medieval and Renaissance Europe.

#### **The Objectives**

The students will learn about knights from direct interaction with objects that belonged to knights and represented their particular status and purpose in society.

Through observation and handling of simple mechanical objects and discussion of their relative advantages and disadvantages, the students will gain a better understanding of basic technological needs and developments.

The students will learn to see artistic beauty and symbolism in objects that they may not initially consider works of art.

#### **The Input**

Students will be asked to respond to questions as the lesson is taught.

#### **The Check for Understanding**

Students will be asked to apply knowledge gained from examining one object toward understanding the forms and purposes of other objects shown later in the presentation.

The homeroom teacher may follow up the presentation with curriculum materials and ideas taken from this packet or from sources listed in the bibliography.

#### **The Closure**

Students will visit the Armor Court of the Cleveland Museum of Art, where they will be able to apply the knowledge they have gained in handling individual pieces in their classroom toward an understanding – historical, technological, and artistic – of the complete suits of armor in the museum gallery.

## Getting Ready for the Visit

### General Information

- The Art To Go presentation takes approximately 40 minutes.
- Anyone who wishes to handle the objects *must* wear gloves, which will be provided by the Art To Go staff.
- We respectfully request that a homeroom teacher or events coordinator be present and attentive during the presentation.

### Classroom Configuration

Experience has shown that certain classroom configurations are more suited for an Art To Go presentation than others:

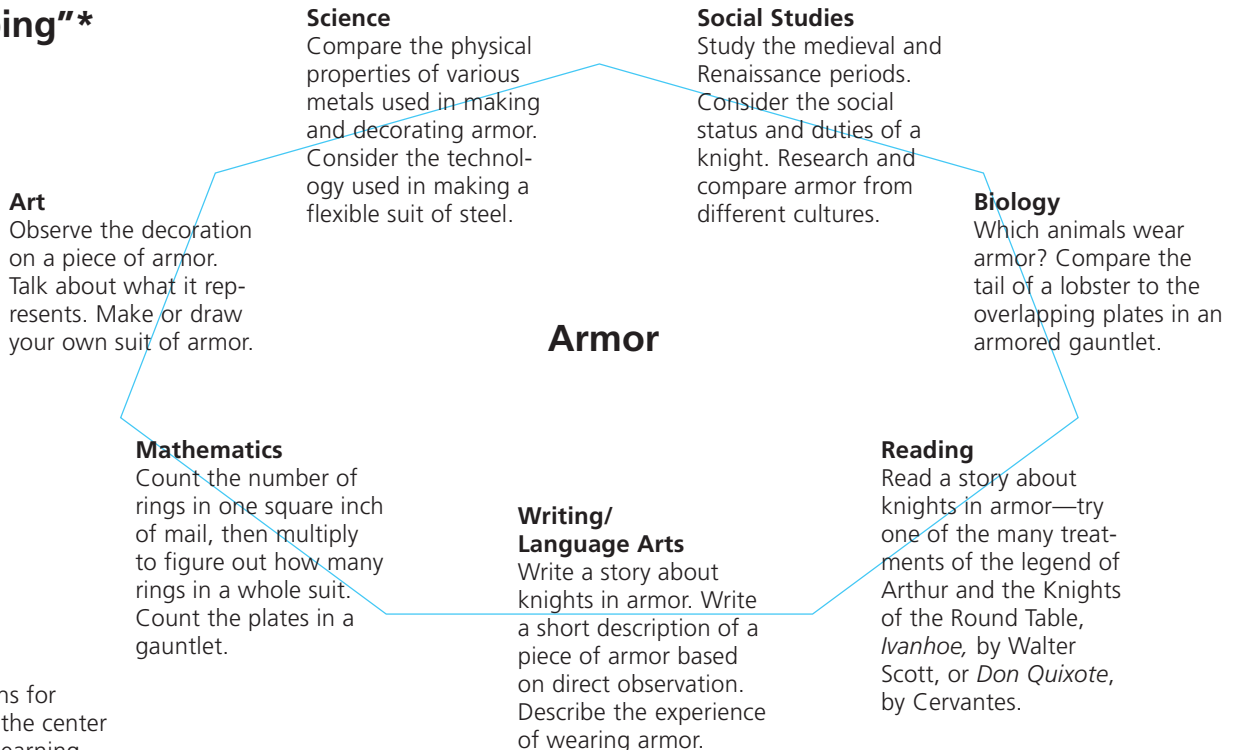
- Please have a small table or desk available at the front of the room. Please have the it clear when the Art To Go Teacher arrives.

- If possible, arrange the students in a semicircle facing the table or desk at the front of the room. The Art To Go Teacher will pass objects from student to student. This is more easily done if the students are seated in a line than in clusters of desks.

- Please display the students' names clearly either on their desks or on themselves.

We realize that it may not be possible for all teachers to rearrange their classrooms for an Art To Go presentation. It should be noted, however, that the quality of the experience may be greatly improved by following these recommendations and providing a suitable environment for the presentation.

## "Webbing"\*



\*Suggestions for making art the center of student learning.

## Suggestions for Further Reading

### Especially for Children

We heartily recommend the Eyewitness Books series published by Alfred A. Knopf, New York. In relation to this particular Art To Go Suitcase, see *Arms and Armor* by Michelle Byam and Dave King, and the other Eyewitness Books: *Knight, Castle, Battle, and Medieval Life*.

### Historical Background

*Arms & Armor* by Stephen N. Fliegel (Cleveland: The Cleveland Museum of Art, 1998)

181 pages, with color illustrations, glossary, and checklist of objects. This easily read text considers the development of European arms and armor from antiquity through the Renaissance, the decoration of arms and armor, and technical aspects. Based on the collections of the Cleveland Museum of Art and published for the reinstallation of the Armor Court in 1998.

*Armourers* by Matthias Pfaffenbichler (London: British Museum Press, 1992)

72 pages, with color illustrations, glossary. Paperback only. Top-quality publication on armor and the artists who made armor. Includes a wealth of information on how armor was made. May be difficult to find.

*An Historical Guide to Arms & Armor* by Stephen Bull (New York: Facts on File, 1991)

224 pages, with color illustrations. Good introduction and survey of arms and armor from the Greeks to the modern era. Also includes chapters on firearms and arms and armor from non-western cultures.

*Arms and Armor in The Art Institute of Chicago* by Walter J.

Karcheski, Jr. (Chicago: The Art Institute of Chicago, 1995)  
128 pages, with color illustrations, glossary, and checklist of objects. Easy-to-read, this book presents numerous full color illustrations from the various collections of the Art Institute of Chicago. Includes basic history and discussion of armor, seen through this particular museum's collection.

*Knights* by Andrea Hopkins. (Shooting Star Press, Inc., 1990)  
191 pages, with color illustrations, maps, diagrams. Extensive discussion of knighthood—good introduction to the subject. Contains much information on arms and armor, including excellent illustrations of the development of armor (see pages 130–133).

Additional sources, including articles and specialized studies, can be found through the bibliographies in the volumes listed above.

### Website

[www.clemusart.com](http://www.clemusart.com)  
We encourage teachers and students alike to visit the Cleveland Museum of Art in person. We also encourage interested teachers and students to visit the museum's website, where information about the museum's collections and educational programs can be found.

A lighthearted approach to arms and armor in the Cleveland Museum is presented at the same site through the education links. Click on "Defend Yourself, Good Knight" or go directly to <http://www.clemusart.com/health/armor>

# Cool Knights: Armor from the European Middle Ages and Renaissance

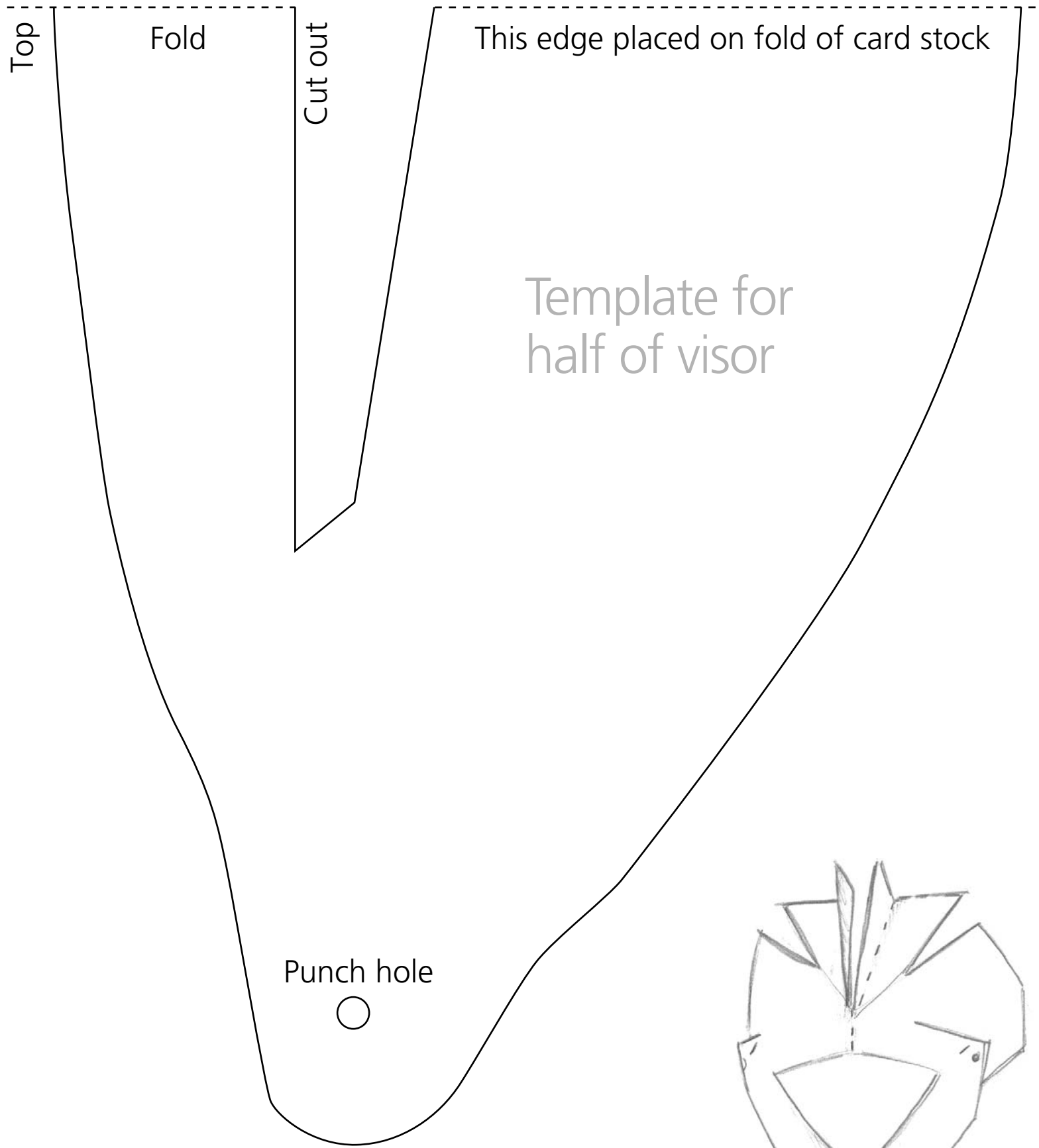
THE CLEVELAND  
MUSEUM OF ART  
Department of Education  
and Public Programs  
11150 East Boulevard  
Cleveland, Ohio  
44106-1797

ART TO GO SERVICES  
216-421-7340 x 160  
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the Arts, a federal agency,  
and Toshiba International  
Foundation.







# Make Your Own Helmet!

In the packet you will find patterns (templates) for a helmet and a visor. These were made on 11" x 17" paper so that they could be reproduced on a copy machine and used as patterns to be cut out and traced onto tougher material such as card stock or tag board. Construction paper is practical, but less desirable for strength.

The helmet will require a 18" x 24" piece of stock. Fold it in half. It should now be 12" x 18". Place the inside edge of the helmet pat-

tern on the folded edge of stock, trace it carefully, and cut it out.

Cutting the material folded saves time and insures that the final product will be more symmetrical. Folds add strength to the card stock just as they do to the steel of a real helmet. Now would be a good time to punch the holes needed for assembly.

Cut on solid lines. Dotted lines indicate folds.

Breathing holes can be punched in the visor in even rows or creative patterns. On

what side of real helmets were these ventilation holes found? The visor viewing slot or opening can be made larger or configured differently.

The folds on top of the helmet can be folded out or in (depending on the contour you prefer and what you want to add to the top). This should be done before assembling the helmet.

Plumes, wings, and animals heads or figures can be added to adorn the helmet. Obviously, all decorations of helmet

and visor surfaces should be done prior to assembly.

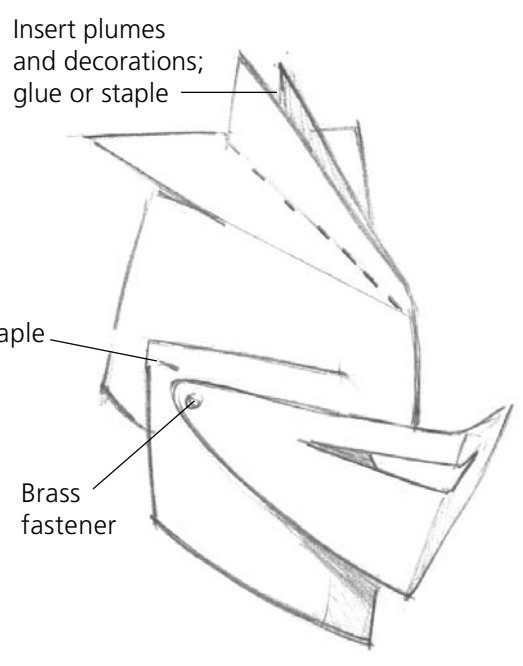
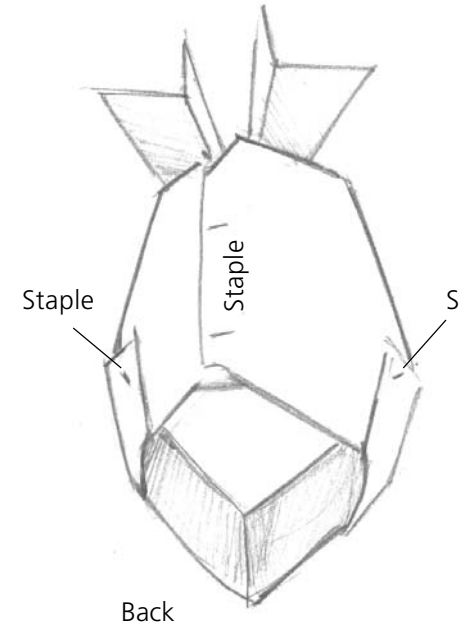
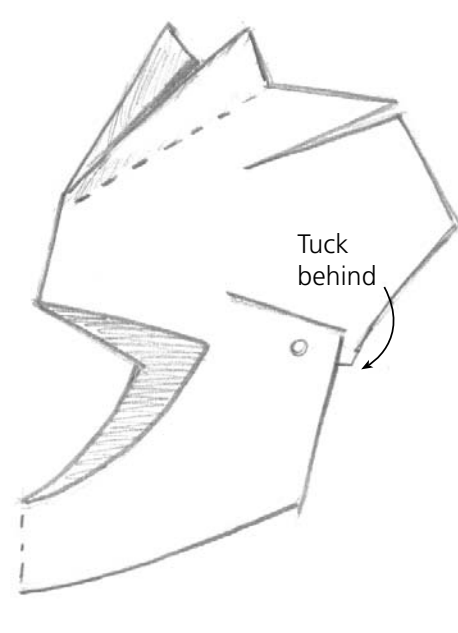
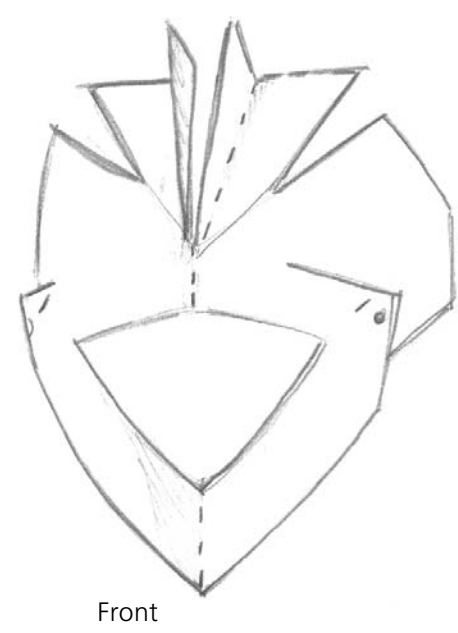
Line up the holes on one side of the helmet, and staple. Align holes on the other side of the helmet. Staple. Attach the visor to the helmet with a brass fastener. Be sure you have the correct side of the visor up.

Bring the ends of the helmet around back of the knight's head. Check fit. Holding the ends together, remove the helmet from the wearer's head and staple the ends together. The visor

should move up and down freely and not catch on the various attachments you may have added.

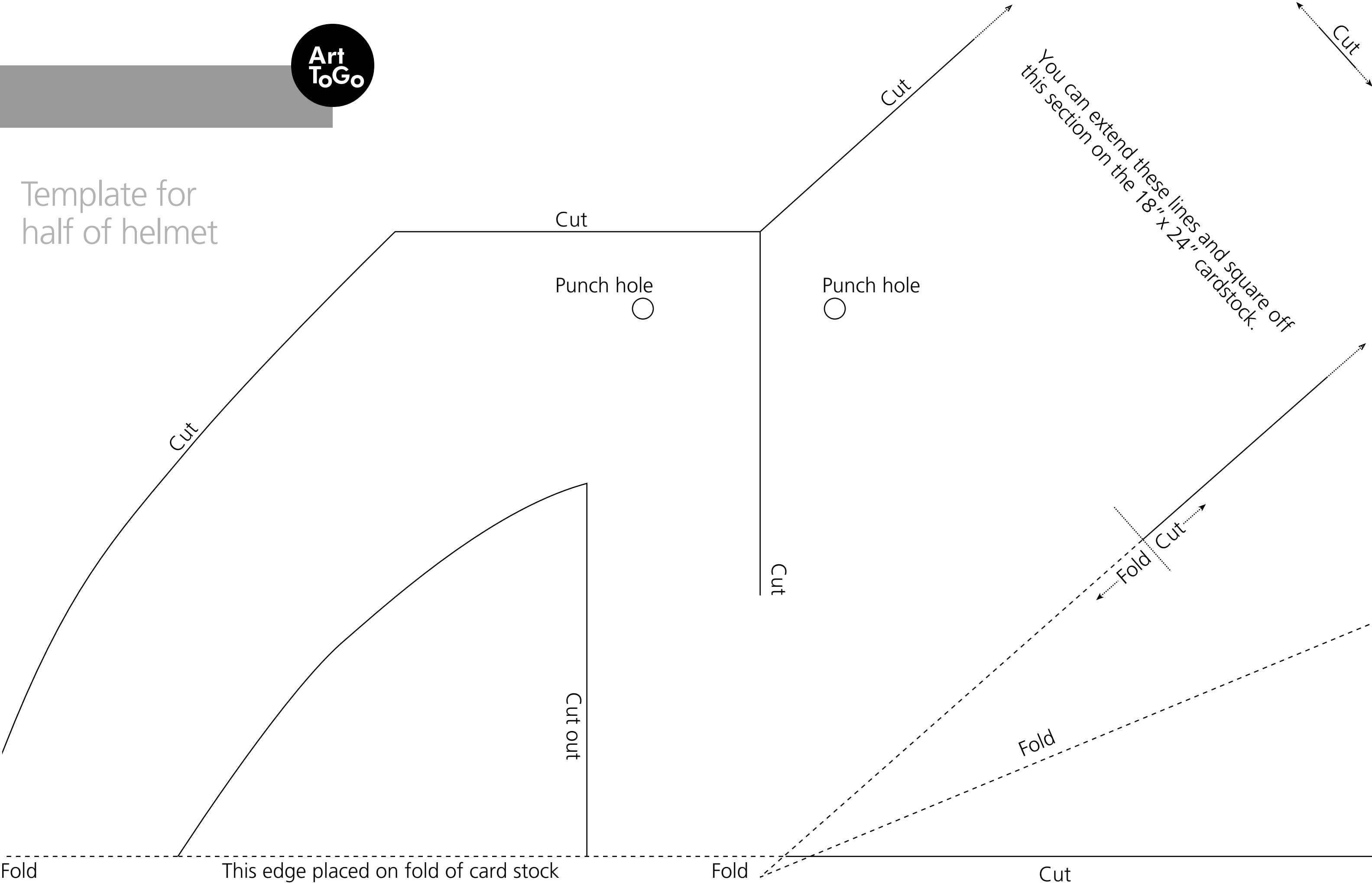
Decorative elements might include coats of arms, repeated patterns in bands, appropriate rubber stamps (colored with markers, so you won't need pads), Styrofoam stamps, or trompe l'oeil rivets with shadows and high lights.

If you have any questions, please contact Bob Dewey at the Cleveland Museum of Art. 216-421-7340, ext. 487





# Template for half of helmet



## Cool Knights: Armor from the European Middle Ages and Renaissance



Quarrel (Crossbow Bolt)  
Germany or Austria, late 16<sup>th</sup> century  
1916.1960



Breastplate  
Germany or Austria, late 16<sup>th</sup> century  
1916.1792



Gauntlet for the right hand  
Germany, late 16<sup>th</sup> century overall  
1916.1933



Close Helmet  
South Germany, about 1590  
1916.1932



Fragment of Mail  
Date unknown  
S97/1



Vambrace  
South Germany, 16<sup>th</sup> century overall  
1924.619c