

# 4-H Shooting Sports



Archery Projects  
Target Archery  
3-D Archery

## **Standard Archery Range Rules**

1. Know and obey all range commands
2. Keep your arrows in your quiver until you are told to shoot.
3. Always wear your arm guard and finger tab.
4. Only use the arrows the instructor gave you.  
Remember what they look like.
5. Always keep your arrows pointed down or towards the target.  
Shoot only at your target.
6. If you drop an arrow, leave it on the ground until you are told to get your arrows.
7. Always walk at the archery range.

### **Archery Range Whistle Commands**

Two Blasts — “Archers to the shooting line.”

One Blast — “Begin shooting.”

Three Blasts — “Walk forward and get your arrows.”

Five or More Blasts (series of blasts) — “STOP SHOOTING Immediately and put your arrows in your quiver.”

### **Archery Range Procedures**

Stand behind the waiting line until you hear 2 whistles or “Archers to the shooting line.” Pick up your bow and straddle the shooting line.

Keep your arrows in your quiver until you hear 1 whistle or “Begin shooting.”

After you have shot all your arrows, step back from the shooting line, set your bow on the rack, and wait behind the waiting line.

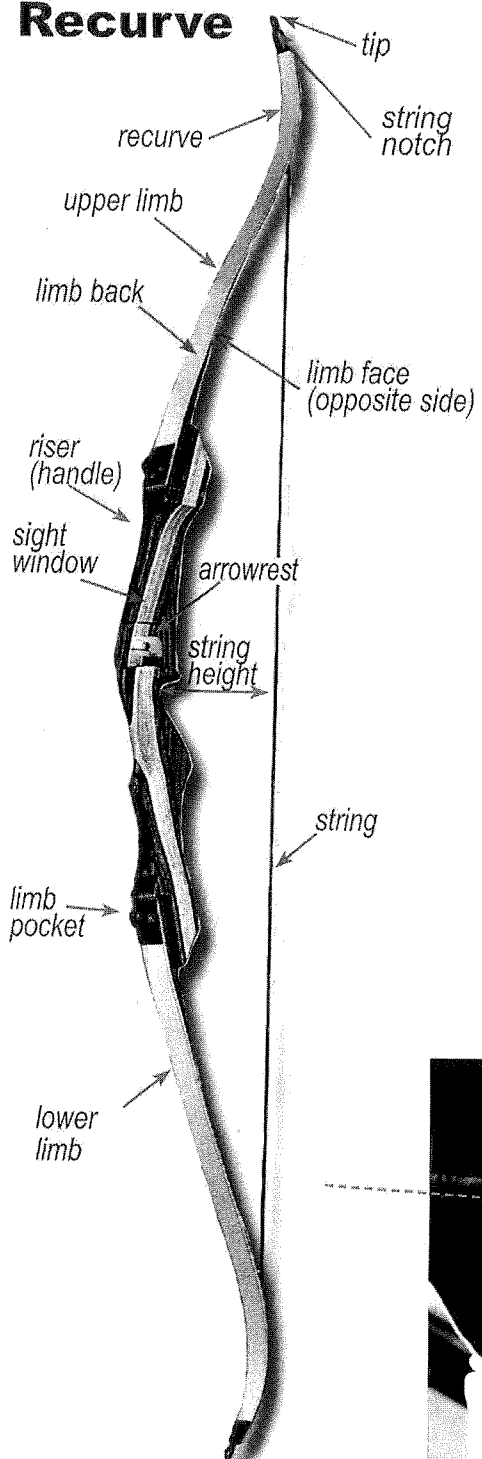
After everyone is done shooting and behind the waiting line, the instructor will blow the whistle 3 times. “Walk forward to get your arrows...Stop at the target line.”

### **Pulling Your Arrows**

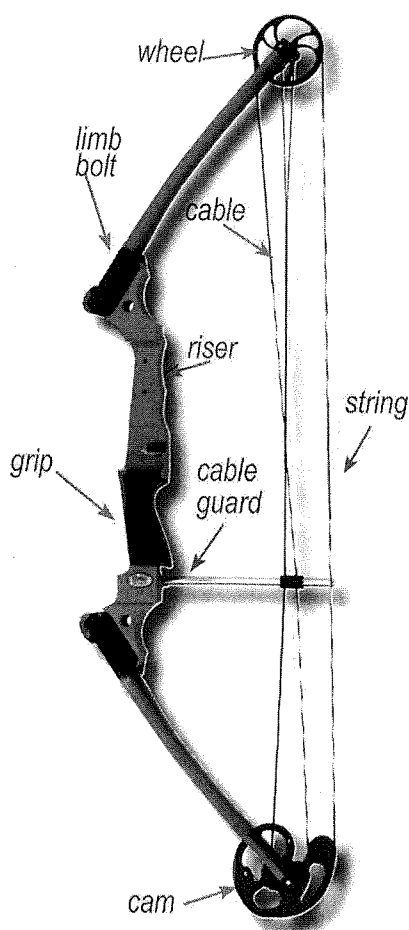
- Two archers at a time, from each target, may go forward from the target line to pull their arrows.
- Stand to the side of the target and make sure that no one is standing behind your arrows.
- Pull your arrows out one at a time, and put them in your quiver.
- After you have pulled all of your arrows, return to the waiting line.

# COMMON ARCHERY EQUIPMENT PARTS

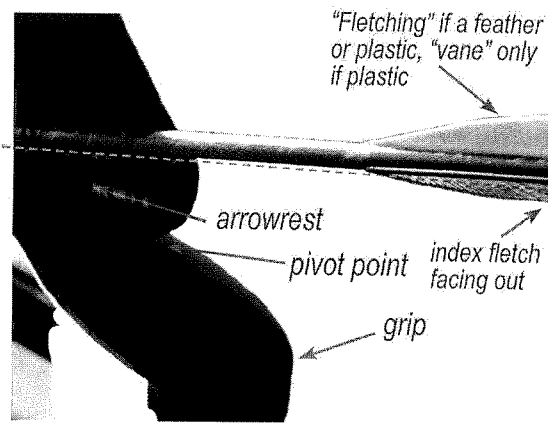
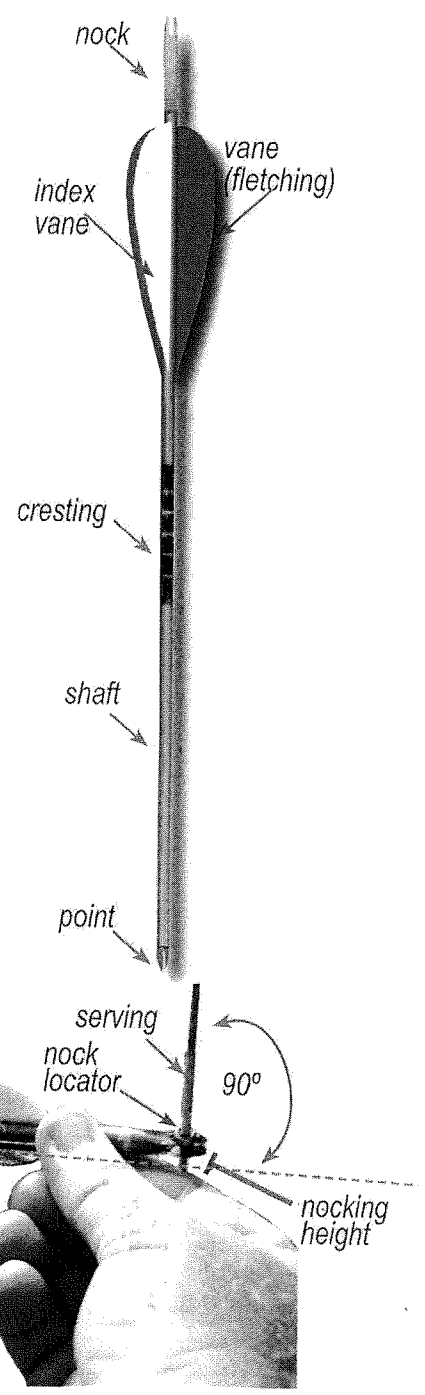
## Recurve



## Compound

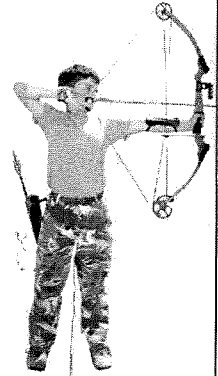


## Arrow

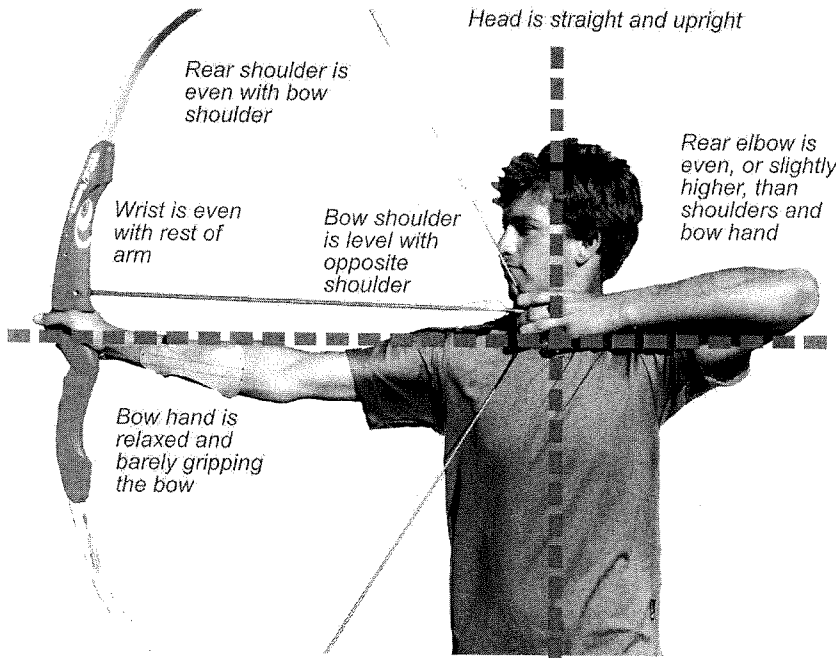


# PROPER SHOOTING FORM

The basic form—standing straight and tall like the letter “T”—is widely held as being the best and easiest to coach beginning archers.



Compound Archer



Head is straight and upright

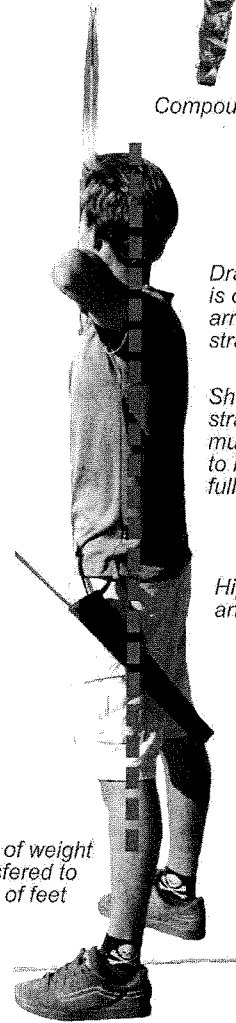
Rear shoulder is even with bow shoulder

Wrist is even with rest of arm

Bow shoulder is level with opposite shoulder

Rear elbow is even, or slightly higher, than shoulders and bow hand

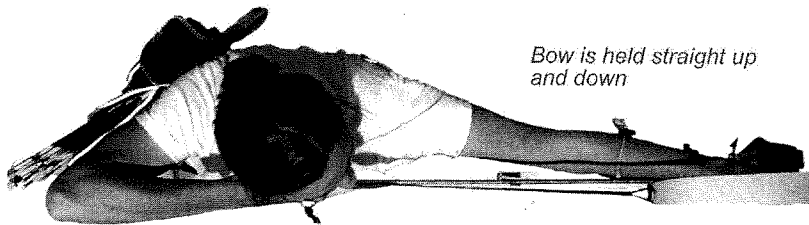
Bow hand is relaxed and barely gripping the bow



Drawing arm is drawing arrow straight back

Shoulders are straight. Back muscles helping to hold bow at full draw

Hips are straight and even



Bow is held straight up and down

60% of weight transferred to balls of feet

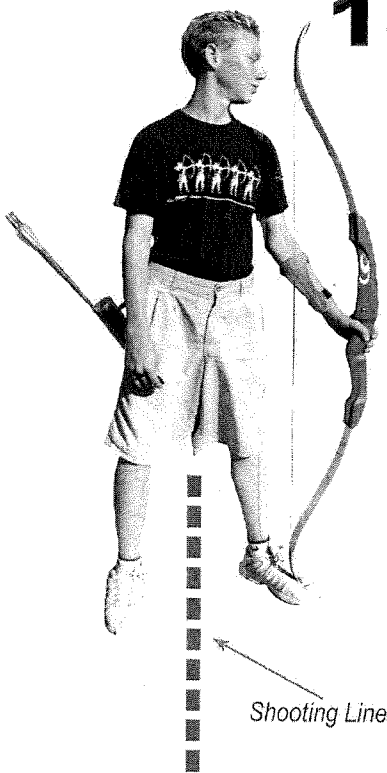
# 10 Steps of Shooting

## 1. Stance and Posture

Place one foot on each side of the shooting line. Find a comfortable balanced stance with your feet shoulder-width apart, turned up to 30-degrees towards the target.

Stand straight, keeping your ribs and chest down, and your bottom tucked under your body. Keep your shoulders down and relaxed.

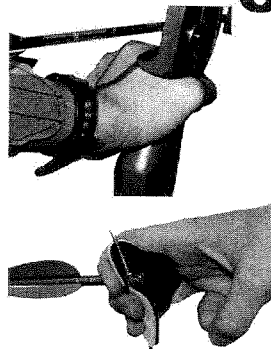
Archers shooting in a wheelchair should place one wheel on each side of the line.



## 3. Hook String & Place Bowhand

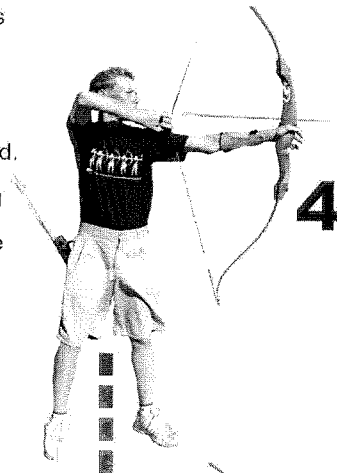
Set your bow hand on the grip using only the web and the meaty part of your thumb, with your knuckles at a 45-degree angle and your thumb pointed towards the target. Keep your bow hand in place throughout the entire shot.

Set the first groove of your first 3 fingers around the bowstring creating a hook. Keep the back of your drawing hand flat and relaxed.



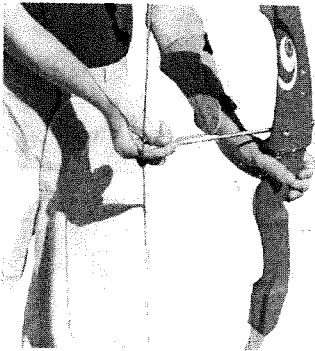
## 4. Set-up

Raise your bow arm towards the target, while keeping your shoulder down and aligning your chest perpendicular to the target. Your drawing arm should be near the level of your nose. Your bow arm elbow should be rotated so it is straight up and down.



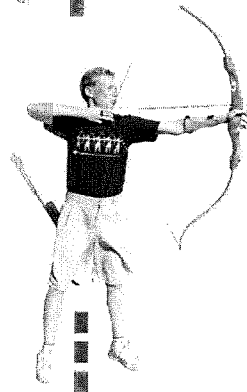
## 2. Nocking the Arrow

Place the arrow on the arrow rest, holding the arrow close to the nock. Keep the index fletch pointing away from the bow. Snap the nock of the arrow onto the bowstring under the nock locator (or between the nock locators if there are two).



## 5. Drawing

Draw the string back in a straight line from the set-up to the side of the face anchor point. As you approach your anchor, set the drawing arm shoulder back and down as far as possible, until your elbow is directly behind or a little bit higher than the arrow.





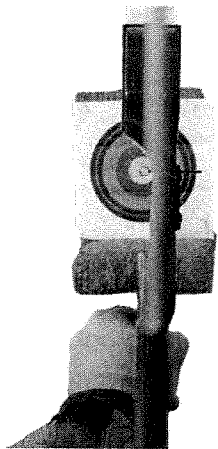
## 6. Anchor

Draw the string to the side of your face, placing the tip of your first finger on the corner of your mouth. Keep your hand snug against your face folding your thumb down and your little finger towards your palm.



## 7. Load Transfer then Hold

At full draw, transfer the weight of the bow from your arms and shoulders to your back. Feel your back muscle tighten as your shoulder blades move down and towards your spine (this step may be easier to understand for older archers). Feel the power in your back as you rotate your elbow behind the arrow.



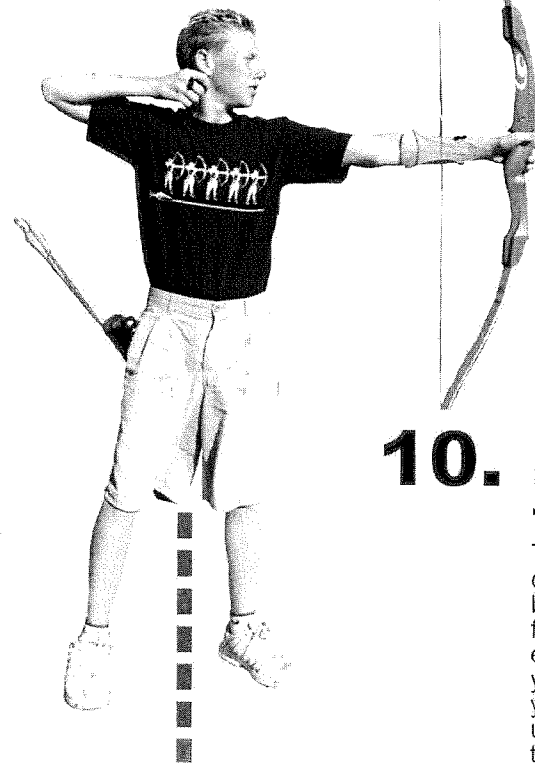
## 8. Aim & Expand

Look at the target, or through the sight, while keeping your focus on your form. Line the string up down the center of the bow.



## 9. Release

Begin a slight expansion from the center of your chest as you allow the string to leave your fingers, pushing them out of the way. It should feel as if the string has gone through your fingers. Continue the expansion and follow through as in the Release Motion Drill.

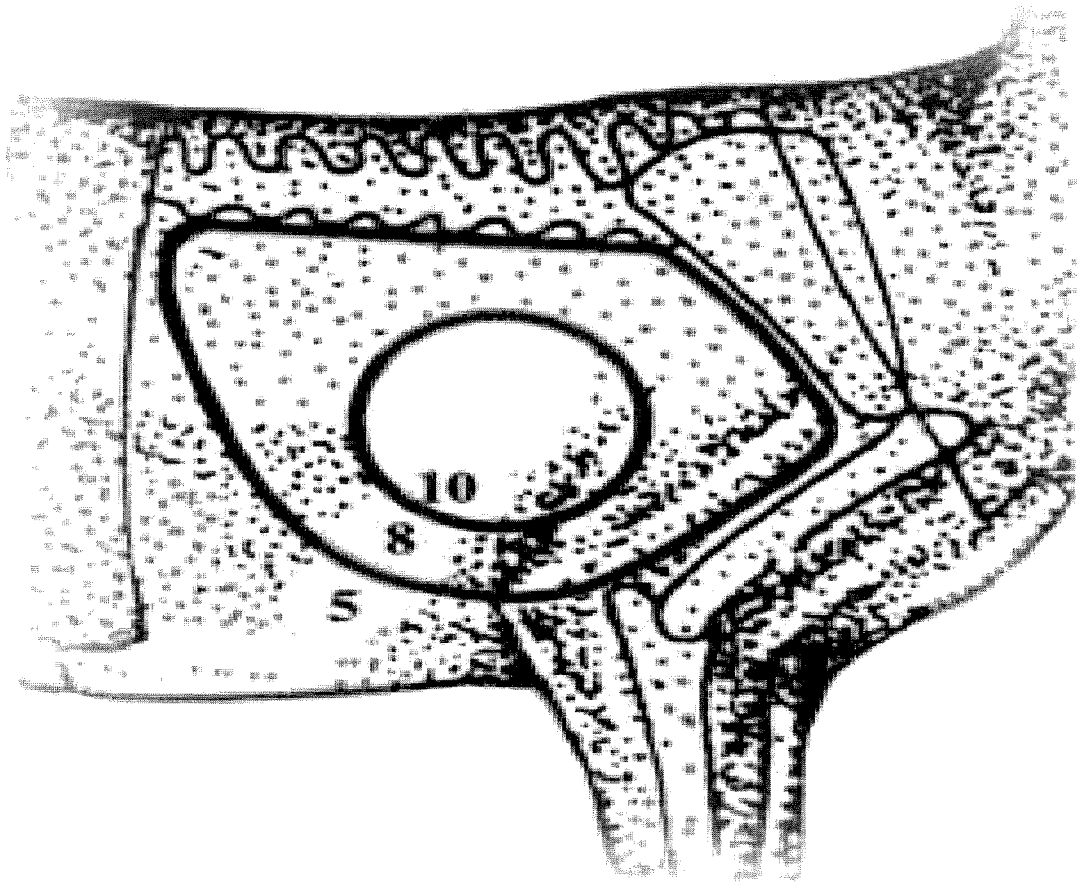


## 10. Follow-through

The drawing hand continues back beside neck with fingers relaxed, ending up behind your ear. Maintain your follow-through until the arrow hits the target.

## 3-D Archery Guidelines

1. Participants will travel along a 30-station walk-through range at the tournament site in a group of four shooters. An adult will either accompany the group, or will be stationed at each target to call arrows and score.
2. Participants will shoot a near full-size silhouette animal targets at various unmarked distances of no more than 15 yards (Beginner), 20 yards (Junior), or 25 yards (Senior). Each shooter will have 30 seconds to shoot one arrow at each target while touching the marker stake with his/her foot.
3. Bows must be drawn only in the down range position, and never be elevated above the level of the target. Once at the shooting position, each participant may adjust his/her bow accordingly.
4. Scoring will be based on 10-point and 8-point rings in the vital area (lung, liver, double lung). Arrows outside the scoring ring will receive 5 points. Arrows completely missing the target will be scored as a "0". (see diagram)
5. Scorekeepers will make the final calls on arrow placement and mark scorecards in ink. Participants must agree with the final score and sign the scorecard. Unsigned scorecards will not be accepted. Once the scorecard is signed, **ALL SCORES ARE FINAL**.
6. Arrows may be retrieved only after the group has finished shooting. Shooters will have a maximum of 5 minutes to look for lost arrows. The adults accompanying the group shall remain at the target to prevent another group from firing before all participants have retrieved their arrows and are behind the firing line.
7. Exceptions to the above may be made at the discretion of the range officer for such incidents as equipment breakdowns, or variations in conditions of the walk-through course at the tournament site. Major breakdowns will end participation in this event, just as major breakdowns end hunting.



### Scoring 3-D Targets

3-D targets have three scoring rings.

Hits within the heart-lung area, bounded by a large, irregularly shaped ring, are scored as **8 points**.

Hits within the heart-lung area, bounded by the smaller circular ring that represents a perfect heart shot; are scored as **10 points**.

**Arrows that are touching a line, score the higher value of the two regions.**

Hits outside of all rings score **5 points**, with the **exception** that hits on the horns or hooves **score zero "0"**.

Arrows completely missing the target will be **scored as a zero "0"**.



## Ingham County 4-H Shooting Sports Guidelines

Use 4-H Shooting Sports Archery Manual as a guide to teach requirements.

<b>Archery Knowledge Requirements</b>	
	<b>Ages 9 through 18</b>
<b>Safe Bow/Arrow Handling Rules</b>	Know whistle commands. Know proper procedure for pulling arrows. Know how to string a recurve bow using a bow stringer. (If using a recurve bow.)
<b>Parts of the Bow (You are using)</b>	Know Parts of Recurve Bow: lower & upper limbs, string, string height, arrow rest, sight, sight window, limb back, limb face, recurve, string notch, tip
	Know Parts of Compound Bow: Limb bolt, grip, wheel, cam, riser, cable guard, cable, string
<b>Parts of the Arrow</b>	Know Parts of Arrow: point, shaft, cresting, index vane, vane (fletching), feathers, veins, nock
<b>Accessory Equipment</b>	Know Accessories: quiver, arm guard, finger tabs, release, target, stringer, case
<b>Equipment</b>	Know types of bows; compound & recurve Know types of arrows; wood, fiberglass, aluminum, carbon Know the targets used for events they participate in. Know yardage they are to shoot for division they are currently in.
<b>Dominate Eye</b>	Know how to determine their dominate eye. Know what their dominate eye is, right or left. Know they it is important to use your dominate eye.
<b>Transporting Firearms</b>	Know and demonstrate they can properly transport bows/arrows safely. Transport bows in a case and recurves must be unstrung.
<b>Archery Marksmanship</b>	Demonstrate they are confidently handle a bow in a safe manner at all times using proper attitude.

<b>Shooting Fundamental Requirements</b>	
<b>Range Safety Rules</b>	Know the Standard Archery Range Rules Know whistle commands. Know proper procedure for pulling arrows.
<b>Archery Basics</b>	Know & Develop 'Proper Shooting Form' (Letter T) and 'Proper Release'. Know the "10 Steps of Shooting". Know Shooting Sequence. (Pg. 19-20, Sequence of what happens on the range.)
<b>Shooter's Log</b>	Learn how to keep and the importance of using a shooter's log.
<b>Self Control</b>	Learn & demonstrate the proper knowledge. Skills & attitude required to be a safe shooter.

<b>Additional Archery Knowledge</b>	
<b>3-D Rules &amp; Regulations</b>	Refer to Michigan 4-H Shooting Sport Guidelines for 3-D competition.
<b>Shooting Distances</b>	Learn to judge and successfully shoot at various distances; 5 to 30 yards.
<b>Scoring System</b>	Know the 3-D scoring system for Michigan 4-H activities.

## Ingham County 4-H Shooting Sports Annual Archery Project Participation Form

<b>Shooter's Name:</b>	4-H Age ____ Beg. Jr. Sr.
<b>4-H Club Name:</b>	<b>Date Started Course:</b>
<b>Certified Archery Instructor's Name:</b>	<b>Phone:</b>
<b>Equipment: (circle) Compound    Recurve                      Sighted    Unsighted    Open (Release)</b>	

Archery Knowledge Requirements	Completion Date	Shooter's Initials	Instructor's Initials	Comments
Safe Bow/Arrow Handling Rules (Any time a bow is handled.)				
Types & Parts of the Bow and their functions				
Parts of the Arrow and their functions				
Accessory Equipment				
Equipment: Types of bows & arrows Targets used in your division Yardage for your division				
Dominate Eye Exercise				Left / Right (Circle One)
Transporting Bows/Arrows				
<b>Archery Marksmanship</b> Demonstrate confident & safe bow/arrow handling, w/ proper attitude.				
<b>Verification</b>			Certified 4-H Shooting Sports Instructor Signature:	

Shooting Fundamental Requirements	Completion Date	Shooter's Initials	Instructor's Initials	Comments
Range Safety Rules Standard Archery Range Rules. Whistle commands. Procedure for pulling arrows.				
Archery Basics Proper Shooting Form "T". "10 Steps of Shooting" Shooting Sequence.				
Self Control				
<b>Shooting Fundamental Verification</b>			Certified 4-H Shooting Sports Instructor Signature:	

Additional Archery Knowledge	Completion Date	Shooter's Initials	Instructor's Initials	Comments
3-D Rules & Regulations				
Shooting Various Distances				
Scoring System				
<b>3-D Rules &amp; regulations Verification</b>			Certified 4-H Shooting Sports Instructor Signature:	

This form must be completed under the direction of and signed by a Michigan 4-H Shooting Sports "Certified Archery Instructor". The instructor must be registered with the Ingham County 4-H Office. Completed forms must be presented to fair registrar each year.

By signing this form the instructor is verifying that the above named shooter has successfully completed the "4-H Basic Archery Course" as outlined in the National 4-H Shooting Sports Curriculum and the training provided has been in compliance with the Michigan 4-H Shooting Sports Program "Safety Practices and Policies" document.