

# A Survey of Injuries Occurring in Dogs Participating in Agility

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Natasha Trentacosta, and Monica Percival

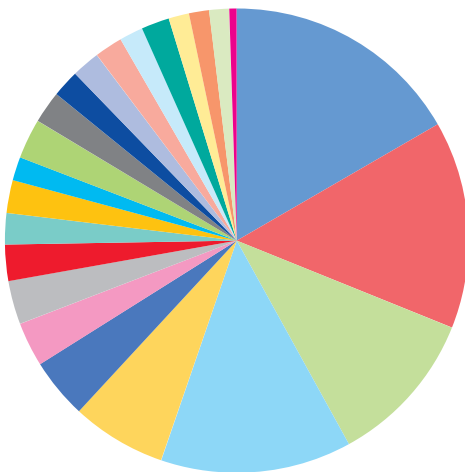
Anecdotal reports of injuries to the dog athletes that participate in agility have raised concerns over specific obstacles, course design, and training methods. Before any changes are made, it is essential to determine if these anecdotes are unfortunate, isolated events or the harbingers of a trend. To achieve this, we need to look at the population at risk (your dogs) and determine the factors that directly affect them. A survey is a useful tool for alerting us to those factors.

One year ago many of you participated in our survey that asked you to report injuries that your dogs sustained while training for, or trialing in, agility. The survey was available on the Clean Run website and as hard copy in the January 2006 issue of *Clean Run* magazine. We requested that you report on the two years prior to the survey and that you respond even if your dogs were not injured. We received more than 1600 responses. We would like to report to you what we have learned.

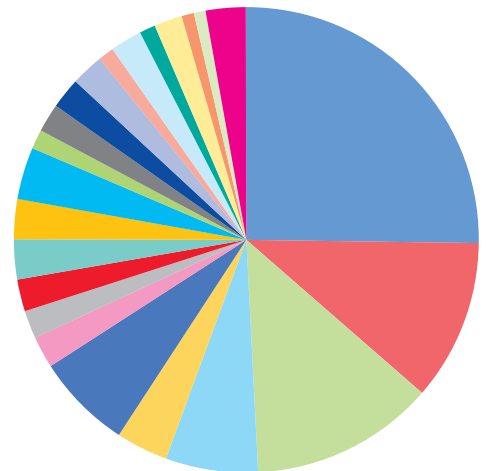
A majority of the responses indicated that your dogs were uninjured (67%). Of the 529 reported injuries, 58% occurred during competition.

Of the injured dogs, Border Collies, Australian Shepherds, and Shetland Sheepdogs were most commonly injured. While Border Collies accounted for 17% of the uninjured dog participants, they made up 25% of the injured population (Figures 1a and b). On the other hand, mixed-breed dogs made up 13% of the uninjured population and only 7% of the injured group.

**1A UNINJURED DOGS BY BREED**

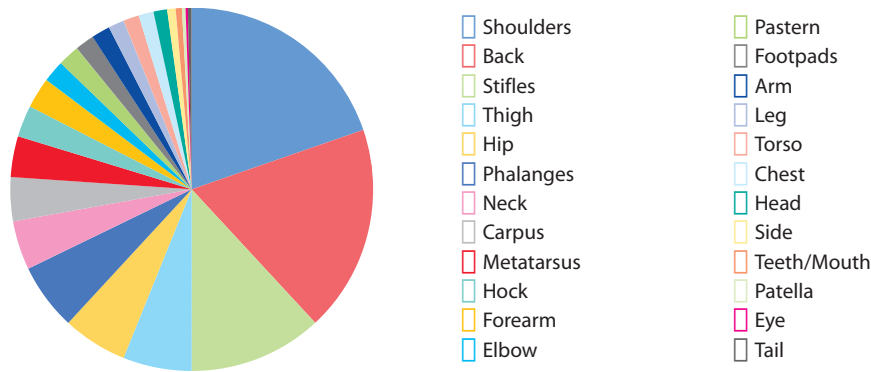


**1B INJURED DOGS BY BREED**

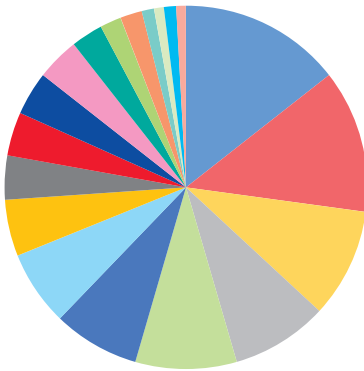


- Border Collie
- Australian Shepherd
- Shetland Sheepdog
- Mixed Breed
- Golden Retriever
- Labrador Retriever
- Belgian Tervuren
- Papillon
- Pembroke Welsh Corgi
- Poodle
- Doberman
- German Shepherd
- Jack Russell Terrier
- Misc.
- Australian Cattle Dog
- Cocker Spaniel
- Dachshund
- Boxer
- Dalmation
- English Springer Spaniel
- Miniature Schnauzer
- Miniature Poodle
- Great Dane

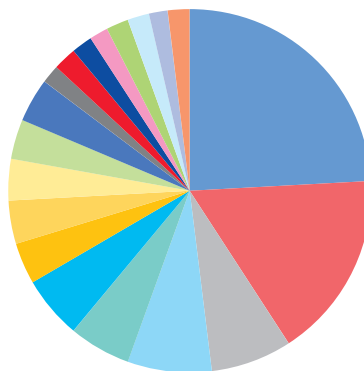
## 2A INJURIES BY BODY PART - ALL BREEDS



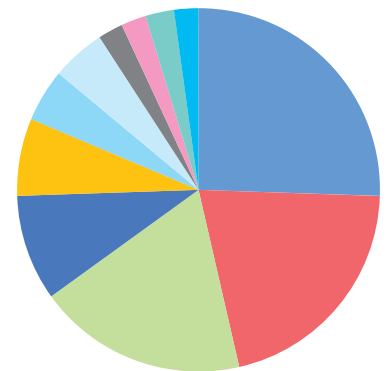
## 2B INJURIES BY BODY PART BORDER COLLIE



## 2C INJURIES BY BODY PART SHETLAND SHEEPDOG



## 2D INJURIES BY BODY PART AUSTRALIAN SHEPHERD



Soft tissue injuries (sprains, strains, and contusions) were the predominant injury type. In general, the shoulders and backs of your dogs (20% and 18% of all injuries respectively) were most commonly injured as shown in **Figure 2a**. The stifle (12%), hip (6%), carpus (6%) and phalanges (6%) were injured less frequently. The three most commonly injured breeds varied in their injury patterns. Border Collies injured their shoulders (15% of their injuries) and backs (13%) most frequently but also injured their hip (10%), carpus (9%), stifle (9%), phalanges (8%), and thigh (7%) as seen in **Figure 2b**. A large portion of the injuries that Shetland Sheepdogs sustained were to their shoulders (24% of their injuries) and back (17%) as shown in **Figure 2c** while Australian Shepherds injured their shoulders (26% of their injuries), back (21%), and stifle joint (19%) with nearly equal frequency as seen in **Figure 2d**.

Dogs were more frequently injured by contact. Contact with an obstacle was only slightly more frequent than contact with the ground. Slips were the predominant cause of non-contact injuries but overuse injuries were reported frequently as well.

The A-frame, bar jump, and dogwalk injured the shoulders and backs of your dogs most frequently as shown in **Figures 3a through 3d**. Twenty seven percent of all injuries on the A-frame and 17% of all injuries from the bar jump were to the shoulder. The phalanges (13%) and metatarsus (10%) were injured on the A-frame less than half as often as the shoulder. Twenty three percent of all injuries on the dogwalk and 17% of all injuries on the A-frame were to the back. Your dogs' thighs were the third most commonly injured body part on the bar jump and dogwalk (12% and 9% respectively). Injuries to the carpus (8%), stifle (8%), and neck (7%) were also seen frequently on the bar jump.

So what did we learn? Many of your dogs participated without injury. Border Collies, Shetland Sheepdogs, and Australian Shepherds were injured most frequently. Border Collies, however, were injured more often than would be expected from their exposure. Dogs were injured slightly more often in competition. The A-frame and dogwalk were responsible for nearly half the reported injuries. Importantly, almost half the injuries on the A-frame were to the shoulder and back while one-quarter of the injuries attributed to this obstacle were injuries to the phalanges and metatarsus.

This survey was a necessary first step; it validated our observations, indicating that these were not isolated events but represented trends. And the next step? The next step is to ask specific questions about these trends.

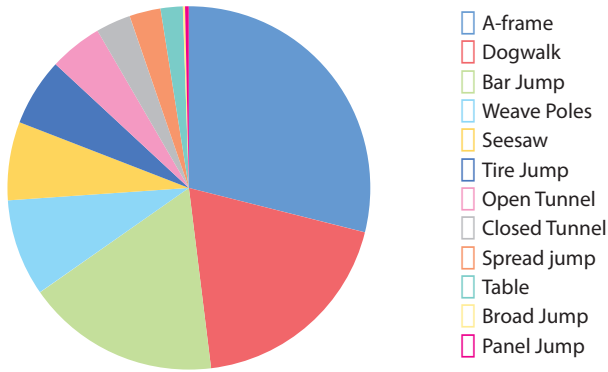
- We need to validate this data prospectively.
- Trials need to be evaluated separately from training and the variability in training techniques needs to be considered.
- A simple method for reporting conformation needs to be developed and its influence on injury evaluated.
- The apparent increase in injury over what was expected by exposure in the Border Collie needs to be verified and explained.
- The variations in equipment and venue need to be considered.
- Finally, we need to prospectively determine the injury rate for this sport.

By establishing a precise rate we can measure the effect of any change. This way, while we are making every effort to decrease the injury rate, we will be able to tell if, in fact, we are making it worse. 🐾

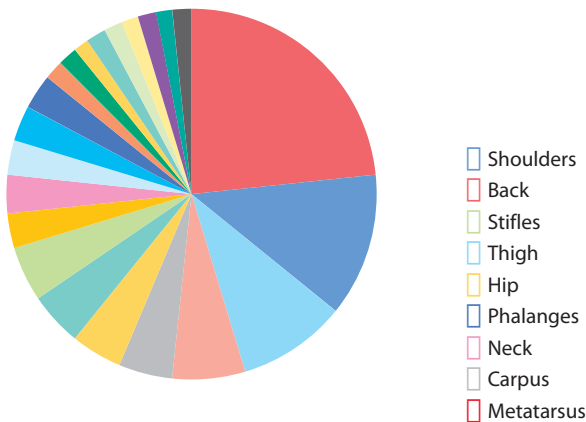
*Martin Levy is Chief of Sports Medicine, Montefiore Medical Center, as well as the Residency Director in the Department of Orthopaedics. His areas of research interest have included human knee and ligament biomechanics and the epidemiology of injuries on artificial surfaces in American football. Marty's current field of interest is in the epidemiology of injuries to dogs and handlers in canine agility. He has been involved in agility for the past six years.*

*Charles B. Hall and Natasha Trentacosta are from the Albert Einstein College of Medicine, Bronx, New York. Monica Percival is editor of Clean Run.*

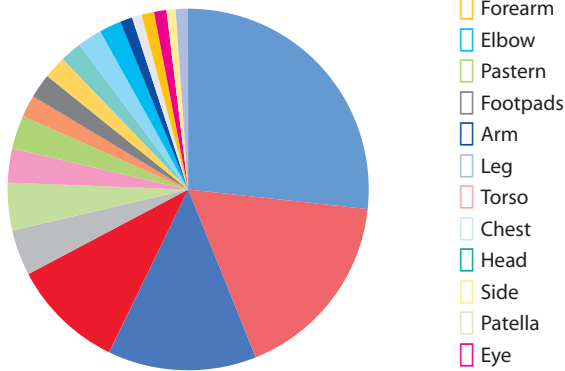
### 3A INJURIES BY OBSTACLE



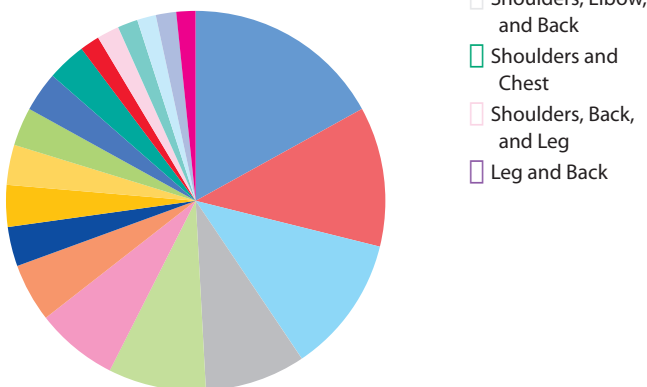
### 3B DOGWALK INJURED BODY PARTS



### 3C A-FRAME INJURED BODY PARTS



### 3D BAR JUMP INJURED BODY PARTS



From the authors of the **IN FOCUS** book,  
a new DVD video

# Do you...

Have a dog that would walk over hot coals to get to agility equipment, but can't be bothered to take direction from you on course?

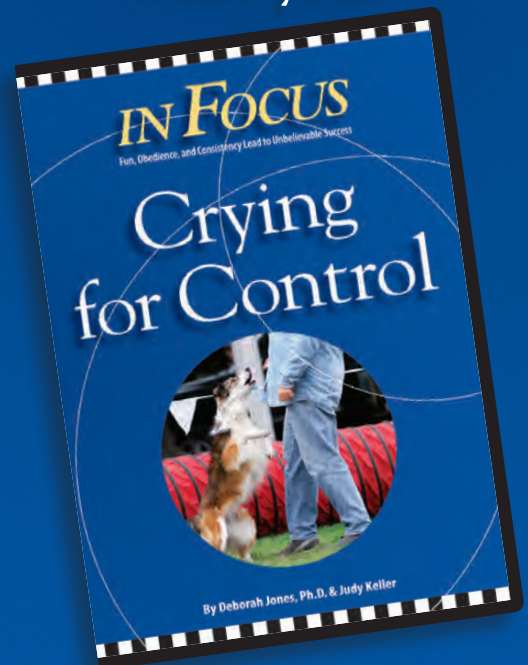
Have a dog that is so obsessed with agility that doing obstacles is the only reward he wants?

Have a dog that happily completes obstacles (even a whole course) on his own without any direction from you?

Have a dog that blasts off the start line, often before you give him a release command?

Have a dog that lacks self-control?

then you need to  
get **IN FOCUS**  
and get your dog  
"in the game"  
with you.



**Clean Run**  
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