

## Earning a Star on a One Day Test

*By Marilyn Grossman*

There are 3 factors that go into calculating points for the one day test score: days fresh, pounds of milk and pounds of butterfat.

Let's walk through an example. My doe, Zuli, kidded on March 6, 2002, and the test date was July 12, 2002. She milked 9.6# milk with 4.3% butterfat. Did she earn a star? Let's do the calculations.

- 1) Days Fresh – you receive 0.1 point for every 10 days completed since the doe freshened, with a limit of 3.6 points. Example: This doe kidded on March 6, 2002 with our milk test on July 12, 2002. You do not round up the decimal points. She was fresh 128 days, and received 1.2 points.
- 2) Pounds of Milk – you receive 1 point for each pound of milk, calculated to one decimal point. Example: This doe milked 3.6# on the first milking, 4.9# on the second milking and 4.7# on the third milking. The first milking does not count. The weights are recorded to verify to the DHI lab and to ADGA that the tester watched the doe being milked out and that she began the test with an empty udder. She received 9.6 points (4.9 plus 4.7).
- 3) Pounds of Butterfat – you receive 1 point for each 0.05 pounds of butterfat produced. Example: This doe's butterfat was 4.3%. Take her pounds of milk, 9.6, multiply by the percent of butterfat, 0.043, equals 0.4128. Divide 0.4128 by 0.05, equals 8.256. Round the number to one decimal place. This gives this doe 8.3 points for butterfat.

Add the 3 totals together - 1.2 (days fresh) plus 9.6 (pounds of milk) plus 8.3 (pounds of butterfat) equals 19.1 points. The minimum points required is 18 points. This doe earned her star.

### Will my doe earn a star?

Assuming your doe kidded within a few months of the test, here is the general rule of thumb to determine how much milk a doe must produce to earn her star. As you can see by the following list, the percentage of butterfat makes a big difference.

6% butterfat would require approximately 8# of milk  
5% of butterfat would require approximately 9# of milk  
4.5% of butterfat would require approximately 9.5# milk  
4% of butterfat would require approximately 10# of milk  
3.5% of butterfat would require approximately 10.5 # milk  
3% of butterfat would require approximately 11# of milk  
2.5% of butterfat would require approximately 12# of milk

The most recent publication of the ADGA performance volumes lists the following average percentages of butterfat for the breeds:

Alpine	3.2%
LaMancha	3.9%
Nubian	4.8%
Oberhasli	3.7%
Saanen	3.3%
Toggenburg	3.0%

Based on ADGA's numbers, a Nubian would need to milk about 9 pounds to earn her star, a LaMancha about 10 pounds, and the Swiss breeds about 11 pounds. However, there are many factors that affect butterfat level. Genetics play a major role, and there is as much variance within the breed as there is from breed to breed. Nutrition plays a major role. Higher butterfat comes from a higher pH in the rumen. High quality roughage fed free choice is the best way to keep the rumen pH high. Feed additives such as sodium bicarbonate and brewer's yeast can elevate butterfat levels. Environmental comforts such as good ventilation and clean, plentiful water help to alleviate the suppression of butterfat from heat stress. Stage of lactation has a major impact on butterfat level. Typically, the butterfat level is highest the first week after a doe kids. It will gradually decline until it levels out at somewhere between 60 and 90 days fresh. It will stay at that level until she reaches about 200 to 220 days fresh, then the butterfat level will begin to climb again. If the doe is between 100 and 200 days fresh, it is safe to assume that her butterfat level will be at her lowest level, and she will need to produce more milk to attain enough points to earn her star.

**How does a star earned on One Day Test compare to a star earned through DHI Test? There are both similarities and differences as follows:**

1. A sire can earn his pluses from his daughters who earn stars from participating in One Day Tests or on DHI test.
2. The "G" in the "GCH" can be attained through stars earned on One Day Test or on DHI test.
3. The chain of the number of stars from dam to daughter (6\*M dam will have a 7\*M daughter) continues on with One Day Test stars or DHI test stars.
4. Rules for a doe to qualify for a star on DHI Test are less stringent. A doe can earn a star through butterfat or milk, without qualifying in both. In the case of a doe earning her star through only one category, the sons are not star bucks. A doe who earned her star on a One Day Test qualifies to have a son who is a star buck kid. In addition to the dam's qualifications, the sire must also qualify for the kid to be a star buck. If the sire is not a star buck, plus buck or an AR buck, he can qualify on his dam's records if she earned her star on One Day Test or if she earned her star on DHI by qualifying with both (not just one) butterfat and milk.
5. Does on DHI test, and their sires, can have genetic evaluations through PTI's, PTA's and USDA's. Scores from One Day Tests do not apply to these genetic evaluations.