# Seed Analysis Card

## Seed Laboratory, Gandaki Province

## Pokhara, Kaski

Kind:                                  Variety:
Date of Registration:          Class:
Weight of sample (g):          Lot number/Mark:
Balance name:                     Test desired:

| |
|---|
| Laboratory Number |

**Physical Purity Test**

Weight of working sample (g)
(a) Original: .....................................
(b) Final: .....................................

| Components | | Grams | % | Grams | % | Average % | Kind and number of admixtures | Remarks |
|---|---|---|---|---|---|---|---|---|
| Pure Seed | | | | | | | | |
| Other Crop Seed | | | | | | | | |
| Weed seed | Common | | | | | | | |
| | Objectionable | | | | | | | |
| | Total | | | | | | | |
| Inert Matter | | | | | | | | |
| Total | | | | | | | Analyzed by: _____ Date: _____ Unit in-charge: _____ Date: _____ | |

**Moisture Test**

| Methods | i | ii | iii | Average % | Remarks |
|---|---|---|---|---|---|
| By Oven | | | | | |
| By Meter | | | | | |

Analyzed by: _____   Date: _____
Unit in-charge: _____   Date: _____

**Other Seed Determination**

| Components | No/kg |
|---|---|
| Other Distinguishable Variety | |
| Other Crop Seed | |
| Weed Seed | |

Analyzed by: _____   Date: _____
Unit in-charge: _____   Date: _____

**1000 Seed Weight Test (g)**

| Test 1 (8 Replications) | | | | | | Test 2 (16 Replications) | | | | | |
|---|---|---|---|---|---|---|---|---|---|---|---|
| 100 seeds | $x$ | $x^2$ | 100 seeds | $x$ | $x^2$ | 100 seeds | $x$ | $x^2$ | 100 seeds | $x$ | $x^2$ |
| R1 | | | R5 | | | R9 | | | R13 | | |
| R2 | | | R6 | | | R10 | | | R14 | | |
| R3 | | | R7 | | | R11 | | | R15 | | |
| R4 | | | R8 | | | R12 | | | R16 | | |
| $\sum =$ | | | $\sigma =$ | | | $\sum =$ | | | $\sigma =$ | | |
| $\sum^2 =$ | | | CV | | | $\sum^2 =$ | | | $x \pm 2 \times \sigma = \ldots$ to $\ldots$ | | |
| $X =$ | | | 1000 Seed Weight $= X \times 10 = \ldots$ g | | | $X =$ | | | $X =$ | | |
| Variance $=$ | | | | | | Variance $=$ | | | $X \times 10 = \ldots$ g | | |
| Analyzed by: $\ldots$ | | | | | | Date: $\ldots$ | | | | | |
| Unit in-charge: $\ldots$ | | | | | | Date: $\ldots$ | | | | | |

# Germination Test

Seed Laboratory, Gandaki Province

Pokhara, Kaski

Germination test begun:      Kind:

Substratum:      Variety:

Temperature:      Production year:

Special treatment:      Balance name/type:

Quantity of Lot:      Germinator number/type:

Seed placed by:      Number of seeds tested:      400 seeds

Name of Oven:

| Laboratory Number |
| --- |

| Date of count | | | | Replications | | | | | | | | | | Tolerance | | Remarks |
|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|
| | | | | 1 | 2 | 3 | 4 | 5 | 6 | 7 | 8 | Total | Average % | For repeated tests | Two | |
| Normal seedlings | | ...First count ...Days | | | | | | | | | | | | | | |
| | | ...Final count ...Days | | | | | | | | | | | | | | |
| | | Total | | | | | | | | | | | | | | |
| Abnormal seedlings | Damaged seedlings | Cotyledon/shoot | a. Cracked | | | | | | | | | | | | | |
| | | | b. Completely separated | | | | | | | | | | | | | |
| | | Badly cracked and splitted | Hypocotyls | | | | | | | | | | | | | |
| | | | Epicotyls | | | | | | | | | | | | | |
| | | | Cotyledons | | | | | | | | | | | | | |
| | | Coleoptile | Damaged | | | | | | | | | | | | | |
| | | | Broken | | | | | | | | | | | | | |
| | | Primary roots | Split | | | | | | | | | | | | | |
| | | | Stunted | | | | | | | | | | | | | |
| | | | Missing | | | | | | | | | | | | | |
| | | Primary shoots | Retarded | | | | | | | | | | | | | |
| | | | Spindly | | | | | | | | | | | | | |
| | Deformed or unbalanced seedling | Hypocotyl | Short and thick | | | | | | | | | | | | | |
| | | Mesocotyl | | | | | | | | | | | | | | |
| | | Epicotyl | | | | | | | | | | | | | | |
| | | Epicotyl | Long, twisted and spiraled | | | | | | | | | | | | | |
| | | Coleoptile | | | | | | | | | | | | | | |
| | | Coleoptile | Split | | | | | | | | | | | | | |
| | | Cotyledons | Curled | | | | | | | | | | | | | |
| | | | Discolored or necrotic | | | | | | | | | | | | | |
| | | Seedlings | Spindly or glassy | | | | | | | | | | | | | |
| Decayed seedlings | | | | | | | | | | | | | | | | |
| Total | | | | | | | | | | | | | | | | |
| Ungerminated seeds | | Fresh | | | | | | | | | | | | | | |
| | | Hard | | | | | | | | | | | | | | |
| | | Dead | | | | | | | | | | | | | | |
| | | Total | | | | | | | | | | | | | | |
| Grand total | | | | | | | | | | | | | | | | |

Analyzed by: _____      Date: _____

Unit in-charge: _____      Date: _____