

Appendix: The known practices and necessary measures/steps for adaptation

<b>Stage 1: At Factory drier mouth</b>
Minimize variation of moisture in dhool fed to the dryer by <ol style="list-style-type: none"> <li>Ensuring even wither in leaf in all the troughs</li> <li>Avoiding surface drying of dhool, maintaining hygrometric difference of 2-3°F in the rolling &amp; fermenting area using humidifiers</li> </ol>
Check & record regularly dried tea moisture content using a Moisture meter (Certified calibration) & inlet hot air temperature & exhaust air/weir-end tea-bed temperature at the collection time of tea sample for moisture determination.
Take follow up action to ensure tea is dried to the desirable moisture level 2.5 - 3.0%.
Conduct drier performance test regularly & check/attend to the followings <ol style="list-style-type: none"> <li>Calibration of dryer thermometers</li> <li>Hot airflow to the dryer</li> <li>Condition of the dryer &amp; its parts</li> <li>Any hot air leak from the drier chamber &amp; dried tea discharge section/mechanism</li> <li>Condition of the feeding conveyor, and dhool spreader &amp; its mechanism</li> <li>Condition of the furnace/air heater &amp; its parts.</li> <li>Smoke leak test</li> <li>Adjust the dryer &amp; operating parameters to ensure moisture content of dried tea (2.5-3.0%)</li> <li>Avoid any fall through &amp; by-passing of dhool in the dryer</li> </ol>
Use cut, split & dried firewood in the furnace/air heater to maintain steady hot air inlet temperature in the drier
Cool the drier mouth teas to 35°C quickly to avoid <ol style="list-style-type: none"> <li>Absorption of moisture &amp; bakey character</li> </ol>
Cover dried teas till the transference to grading room
Transfer dried teas to grading room quickly
Never keep dried tea in the Drying room under any circumstances
Never allocate common section to carry out drying & grading processes together

<b>Stage 2: At Factory dispatch</b>
Monitor relative humidity using hygrometers by maintaining at 60-65% (Hygrometric difference of 6 °F) in the
a. grading area (especially in winnowing area where absorption of moisture is considerably higher)
b. bulking & packing areas
To achieve this,
• Divert some amount of hot air to grading, bulking & packing areas during dryer heating up time
• Avoid ambient air leaking into the grading, bulking & packing areas
• Avoid frequent opening & closing of doors to the grading, bulking & packing areas
• Close wall openings immediately after operating exhaust fan/s in the grading area
• Practice opening of one or two windows carefully in the grading area for effective removal of dust during fan operation to avoid exceeding upper limit of 65 % relative humidity
• Restrict staff & workers from other tea processing sections entering into grading, bulking & packing area
Reduce grading, bulking and packing time as much as possible to minimize exposure of tea,
To achieve this,
• Draw up suitable grading program to complete grading process early
• Avoid number of repasses in grading machinery
• Use required number of machinery & high output machinery
Cover teas due for grading to prevent exposure to air & moisture absorption
Store graded tea under airtight condition in bins
Check moisture content of tea at different stages in grading process using a Moisture meter (Certified calibration) & take follow up action to prevent moisture absorption
Record moisture content of each & every invoice at the time of packing
Separate tea grades with moisture content exceeding maximum & re-fire if necessary
Use appropriate packing materials with SLS logo for packing teas to prevent moisture absorption
Ensure sealing of sacks soon after filling teas
Determine grade mix & curtail reasonably accepted number to minimize handling & exposure

<b>Stage 3: At Pre-auction teas</b>
Pay special care during loading & unloading the sacks filled with tea in transportation to avoid damages
Ensure suitable storage conditions during transportation to brokers' warehouses
Pay special care & attention when teas are stored at the brokers' warehouses
Monitor relative humidity using hygrometers & maintain at 60-65 % (a hygrometric difference of 6 °F) in the warehouses To achieve this,
<ul style="list-style-type: none"> <li>• Operate dehumidifiers where necessary</li> <li>• Avoid ambient air leaking into the warehouse</li> <li>• Restrict &amp; minimize staff &amp; worker movements in brokers' warehouses</li> <li>• Avoid damp floors, walls, equipment &amp; utensils</li> </ul>

<b>Stage 4: At Pre-shipment teas</b>
Monitor relative humidity using hygrometers & maintain at 60-65 % (a hygrometric difference of 6 °F) in the
<ul style="list-style-type: none"> <li>a. bulking/blending area</li> <li>b. value addition &amp; packing areas</li> </ul>
To achieve this,
<ul style="list-style-type: none"> <li>• Operate dehumidifiers where necessary</li> <li>• Avoid ambient air leaking into the bulking/blending/value addition &amp; packing areas</li> <li>• Restrict staff &amp; workers from other tea sections entering into bulking/blending/value addition &amp; packing areas</li> </ul>
Reduce bulking/blending/value addition & packing time as much as possible to minimize exposure to air
Store teas due for bulking/blending/value addition & packing under airtight condition in bins/containers
Check moisture content regularly & record at the time of the bulking/blending/value addition & packing using a Moisture meter, & take necessary follow up actions to prevent moisture absorption
Take necessary steps to separate teas with moisture content exceeding maximum moisture level & re-fire if necessary
Use suitable packing materials for re-packing of blended/value added teas to prevent moisture absorption