# ASCC/Little Jackson 2 "Transition" Marking Guides

Experimental Unit (Cut Unit): T1A(U3/U4), T2A (U15), T3C (U10B/U10C), T4C (U7A/U8)

# Unit T1A Transition (U3/U4)

**Goal:** Create an open, fire-resistant forest structure comprised of thick barked, long-lived and shade intolerant species (PP/DF) capable of withstanding a warmer and drought and disturbance prone future.

## **Objectives:**

Retain low basal area of drought and fire adapted species (PP/DF) primarily in middle sized and large ponderosa pine with minor amounts of large Douglas-fir; Focus on cutting of white fir and Douglas-fir.

- Target Basal Area: 40 ft<sup>2</sup>/ac (range 0-80)
- Retention Priority: PP DF WF (ignore aspen and juniper)
- Reduce nearly all WF in stand; Reduce DF by 80-90%
- Maximum post-treatment opening sizes of 2 acres.

#### Ponderosa Pine

PP 5-20" Mark 1 in 2 of these trees

PP 20"+ <u>Generally keep all of these trees</u>, especially with yellow bark and old characteristics. Only cut seriously mistletoe infested (DMR>4) or declining trees.

# **Douglas Fir:**

DF 5-20" Mark only approximately 1 in 2 of these individuals

DF20"+ Mark all but the most seriously declining, chlorotic (yellowish needles), budworm affected (defoliated) or beetle infested trees.

#### White Fir

WF 0-30"+ <u>Do not mark any white-fir</u> except isolated individuals that are contained within groups of residual DF or PP that cannot be removed unless the surrounding trees are cut.

### **Evaluation Criteria**

Average residual stand basal area of at least 40 ft<sup>2</sup>/ac (+20%)

80-90% of residual basal area in PP; 10-20% of residual basal area in DF; <5% in WF

80-90% of PP and DF >20" retained

# **During marking if BA is low:**

Retain additional PP, if not present, retain DF. Retain poor form PP and DF over WF. Do not retain WF unless for reasons outlined above.

## During marking if BA is low because of large homogenous (>1.5ac) WF patches being cut:

Do not mark WF just to meet BA requirements; Record cut patch location and estimated size (in acres or 1/10ths of acres) in unit diary. Continue marking using a running average BA. Report to presale forester or silviculturist ASAP.

# During marking if BA is high:

Cut additional DF; if DF is running less than 10% of BA, cut PP, focusing on poorest form/health individuals from 5-20"; Cut good form/condition PP if required to reduce basal area.

#### **Watch Outs**

- Consistently low basal area (<40 ft²/ac) across large portions of the unit.
- Many large cut patches of WF approaching 1.5 or more acres in size
- Residual average basal area consistently running over 50 ft<sup>2</sup>/ac. Strive for <50 ft<sup>2</sup>/ac.
- Minimal DF retention or high retention of WF.
- DF trees could be focused in only one area of stand; if this situation is seen an attempt should be made to retain these individuals.
- Missed marking of large and old (>140 yo) DF and PP
- Poor butt marks; trees not marked on two sides ("shoddiness")

If you are running into watch outs, discuss the situation with your crew lead and other timber markers ASAP. The silviculture prescription and marking guide are based on sound, but incomplete information. If you can't create the desired results on the ground, for whatever reason, describe why in the daily diary and communicate this information.

When marking always remember, what you mark or don't mark will be your legacy on this piece of ground for literally a lifetime.

also

# Unit T2A Transition (U15 eastern half)

**Goal:** Create an open, fire-resistant forest structure comprised of thick barked, long-lived and shade intolerant species (PP/DF) capable of withstanding a warmer and drought and disturbance prone future.

**Objectives:** 

Retain low basal area of drought and fire adapted species (PP/DF) primarily in middle sized and Douglas-fir and whatever PP is present; Focus on cutting of white fir and Douglas-fir.

- Target Basal Area: 40 ft<sup>2</sup>/ac (range 0-80)
- Retention Priority: PP DF WF (ignore aspen and juniper)
- Reduce WF by ~90%; Reduce DF by ~60-80%
- Maximum post-treatment opening sizes of 2 acres.

#### Ponderosa Pine

PP 5-20+" Mark all ponderosa pine regardless of condition or infestation. These trees are a minor seed source in this unit.

## **Douglas Fir:**

DF 5-20" Mark approximately 1 in 2 of these trees equally across all diameter classes.

DF 20"+ Mark enough of these trees to maintain 40 ft²/ac (approximately 20-30% of Douglas Fir). Retain the best windfirm and high crown ratio individuals. If possible, try not to mark seriously declining, chlorotic (yellowish needles), budworm affected (defoliated) or beetle infested trees.

# White Fir

WF 0-30"+ Do not mark any white-fir except isolated individuals contained within retained PP/DF patches.

### **Evaluation Criteria**

Average residual stand basal area of at least 40 ft<sup>2</sup>/ac (+20%)

Approximately 2/3 of residual basal area in DF; 1/3 in PP; <5% in WF

All PP retained; Retain enough healthy DF to meet basal area target.

# **During marking if BA is low:**

Retain all PP, if not present, retain additional DF. Retain poor form PP and DF over WF. Do not retain WF unless for reasons outlined above.

## During marking if BA is low because of large homogenous (>1.5ac) WF patches being cut:

Do not mark WF just to meet BA requirements; Record cut patch location and estimated size (in acres or 1/10ths of acres) in unit diary. Continue marking using a running average BA. Report to presale forester or silviculturist ASAP.

# During marking if BA is high:

Cut additional DF in 10-20"+ focusing on poorest form/health individualsDo not cut PP as this species is lacking in this stand.

#### **Watch Outs**

- Consistently low basal area (<40 ft²/ac) across large portions of the unit.
- Many large cut patches of WF approaching 1.5 or more acres in size
- Residual average basal area consistently running over 50 ft<sup>2</sup>/ac. Strive for <50 ft<sup>2</sup>/ac.
- Minimal DF retention or high retention of WF.
- DF trees could be focused in only one area of stand; if this situation is seen an attempt should be made to retain these individuals.
- Missed marking of large and old (>140 yo) DF and PP
- Poor butt marks; trees not marked on two sides ("shoddiness")

If you are running into watch outs, discuss the situation with your crew lead and other timber markers ASAP. The silviculture prescription and marking guide are based on sound, but incomplete information. If you can't create the desired results on the ground, for whatever reason, describe why in the daily diary and communicate this information.

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also

# **Unit T3C Transition (U10B/U10C)**

**Goal:** Create an open, fire-resistant forest structure comprised of thick barked, long-lived and shade intolerant species (PP/DF) capable of withstanding a warmer and drought and disturbance prone future.

**Objectives:** 

Retain low basal area of drought and fire adapted species (PP/DF) primarily in middle sized Douglas-fir and PP; Focus cutting on all species with greatest reductions in WF.

- Target Basal Area: 40 ft<sup>2</sup>/ac (range 0-80)
- Retention Priority: PP DF WF (ignore aspen and juniper)
- Reduce WF by ~90%; Reduce large PP by 50-60%; Reduce all sizes of DF by ~50-70%
- Maximum post-treatment opening sizes of 2 acres.

#### Ponderosa Pine

PP 5-15" Mark all PP (>90%) except for the most mistletoe infested and poorest form/condition trees. These trees are a minor component of this unit.

PP15-20"+ Mark approximately half of these trees. Retain (mark) the largest and oldest growth form trees. Focus cutting (do not mark) "blackjack" (i.e. large but not old) PP

## **Douglas Fir:**

DF 5-15" Mark approximately 1 in 3 of these trees.

DF 15-20+" Mark  $\underline{1}$  in  $\underline{3}$  of these trees. Mark enough of these trees to maintain 40 ft<sup>2</sup>/ac (approximately 20-30% of Douglas Fir). Retain the best windfirm and high crown ratio individuals. If possible, try not to mark seriously declining, chlorotic (yellowish needles), budworm affected (defoliated) or beetle infested trees.

## White Fir

WF 0-30"+ Do not mark any white-fir except isolated individuals contained within retained PP/DF groups.

#### **Evaluation Criteria**

Average residual stand basal area of at least 40 ft<sup>2</sup>/ac (+20%)

Approximately 2/3 of residual basal area in PP; 1/3 in DF; <5% in WF

All old (>140 yo yellow bark PP retained); Retain enough healthy DF to meet basal area target.

Half to just over half of basal area reduction of DF is focused in larger size classes 15-20"+

# **During marking if BA is low:**

Retain additional PP first, if not present, retain additional DF. Retain poor form PP and DF over WF. Do not retain WF unless for reasons outlined above.

## During marking if BA is low because of large homogenous (>1.5ac) WF patches being cut:

Do not mark WF just to meet BA requirements; Record cut patch location and estimated size (in acres or 1/10ths of acres) in unit diary. Continue marking using a running average BA. Report to presale forester or silviculturist ASAP.

# During marking if BA is high:

Cut additional DF in larger size classes focusing on poorest form/health individuals from 15-20"+; Cut good form/condition PP if required to reduce basal area.

#### **Watch Outs**

- Consistently low basal area (<40 ft²/ac) across large portions of the unit.
- Many large cut patches of WF approaching 1.5 or more acres in size
- Residual average basal area consistently running over 50 ft<sup>2</sup>/ac. Strive for <50 ft<sup>2</sup>/ac.
- Minimal DF retention or high retention of WF.
- DF trees could be focused in only one area of stand; if this situation is seen an attempt should be made to retain these individuals.
- Missed marking of large and old (>140 yo) DF and PP
- Poor butt marks; trees not marked on two sides ("shoddiness")

If you are running into watch outs, discuss the situation with your crew lead and other timber markers ASAP. The silviculture prescription and marking guide are based on sound, but incomplete information. If you can't create the desired results on the ground, for whatever reason, describe why in the daily diary and communicate this information.

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also

# Unit T4C Transition (U7A/U8)

**Goal:** Create an open, fire-resistant forest structure comprised of thick barked, long-lived and shade intolerant species (PP/DF) capable of withstanding a warmer and drought and disturbance prone future.

## **Objectives:**

Retain low basal area of drought and fire adapted species (PP/DF) primarily in middle sized and Douglas-fir and whatever PP is present; Focus on cutting of white fir and Douglas-fir.

- Target Basal Area: 40 ft<sup>2</sup>/ac (range 0-80)
- Retention Priority: PP DF WF (ignore aspen and juniper)
- Reduce WF by ~90%; Reduce DF by ~50-70% across all diameter classes
- Maximum post-treatment opening sizes of 2 acres.

### Ponderosa Pine

PP 5-20+" Mark all ponderosa pine regardless of condition or infestation. These trees are a minor seed source in this unit.

### **Douglas Fir:**

DF 5-20"+: Mark approximately <u>1 in 2</u> of these trees to maintain 40 ft²/ac (approximately 20-30% of Douglas Fir). Retain the best windfirm and high crown ratio individuals. If possible, try not to mark seriously declining, chlorotic (yellowish needles), budworm affected (defoliated) or beetle infested trees.

## White Fir

WF 0-30"+ Do not mark any white-fir except isolated individuals contained within retained PP/DF patches.

# **Evaluation Criteria**

Average residual stand basal area of at least 40 ft<sup>2</sup>/ac (+20%)

Approximately 1/2 of residual basal area in DF; 1/2in PP; <5% in WF

All PP retained; Retain enough healthy DF to meet basal area target.

# **During marking if BA is low:**

Retain all PP, if not present, retain additional DF in smallest size classes and larger DF size classes as needed to hit BA target. Retain poor form PP and DF over WF. Do not retain WF unless for reasons outlined above.

# During marking if BA is low because of large homogenous (>1.5ac) WF patches being cut:

Do not mark WF just to meet BA requirements; Record cut patch location and estimated size (in acres or 1/10ths of acres) in unit diary. Continue marking using a running average BA. Report to presale forester or silviculturist ASAP.

# During marking if BA is high:

Cut additional DF in 10-20" focusing on poorest form/health individuals from 5-20"+. Do not cut PP as this species is lacking in this stand.

#### **Watch Outs**

- Consistently low basal area (<40 ft²/ac) across large portions of the unit.
- Many large cut patches of WF approaching 1.5 or more acres in size
- Residual average basal area consistently running over 50 ft²/ac. Strive for <50 ft²/ac.</li>
- Minimal DF retention or high retention of WF.
- DF trees could be focused in only one area of stand; if this situation is seen an attempt should be made to retain these individuals.
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