



TREMBLINGS

NEWSLETTER & BULLETIN BOARD

Vol. 6(4), November 2015

“...partnering to preserve and restore healthy aspen ecosystems.”

NOTICE: The WAA is a user-driven organization. Please send news items and announcements, contributions, **recent reports & publications**, photos, and commentary ideas to Paul Rogers, Director/Editor: p.rogers@usu.edu. We encourage you to share *Tremblings* with your friends and colleagues. **New members welcome!**

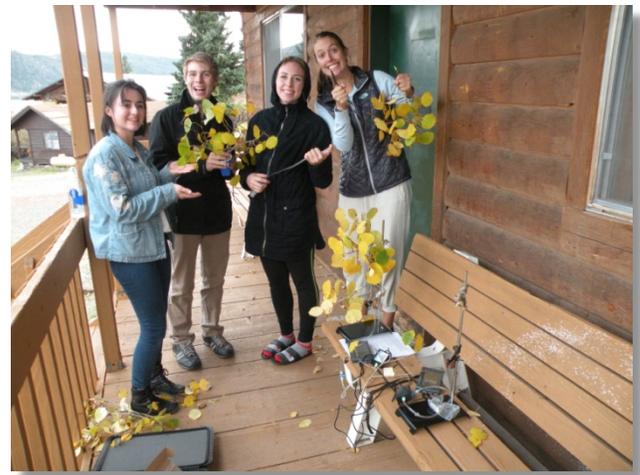
WAA HAPPENINGS

The Shoulders of Giants—Dr. Ronald J. Ryel passed away due to complications from pancreatic cancer Oct. 20, 2015. Ron was a key player in initiating and developing the WAA. He also co-authored several aspen (and other) research papers, mentoring numerous students along the way. Ron's broader professional passion was for plant physiology, ecology, and the application and communication of science to field practitioners. Here at the WAA we'll miss Ron's infectious energy, scientific passion, and gentle giant presence. An obituary detailing Ron's background, plans for a Feb. 2016 memorial service, and a link to the scholarship fund in his name may be found [here](#). Shine on, good friend!

Baccalaureates in the Woods—Ogden (Utah) High School International Baccalaureate program has set its sights on several research questions within the famed [Pando aspen clone](#) in central Utah. On Oct. 9-10 these young scientists put their theories to the test on everything from plant community composition, to soil conditions, to ramet growth/age relations, and plant respiration. WAA Director Paul Rogers spent two days observing projects and answering questions on Pando's history and current condition. If our future lies in the hands of intrepid students like these, we're in pretty good shape!

Online RTW Presentations—For those unable to attend the recent *Restoring the West* conference in Logan, UT audio/video files of presentations may be

accessed after Nov. 15 at USU Forestry Extension, under [Conferences](#) tab. As a reminder this year's theme was, “Restoration and Fire in the Interior West.” In addition to being a broad topic of interest to WAA members, at least three presentations tackled aspen-related topics head on.



Portia Lewis, Paul Cardon, Kayleigh Guiller, and Bridget Dorsey from the International Baccalaureate program measure transpiration from Pando clone branches as part of a broader experiment exploring connections to soil properties (Photo: Paul Rogers, near Fish Lake, UT.).

NRCS and WAA Pen Partnership—The Natural Resource Conservation Service and the WAA recently signed off on a 5-year memorandum of understanding for, in part, "assessing ecosystem conditions; conducting analyses, inventory, monitoring, data acquisition and dissemination; supplementing management guidance; providing conservation planning and mapping; and, other scientific, analytical, training, outreach, and management activities necessary to conserve aspen ecosystems." While MOU activities are still taking shape, we look forward to sharing resources to accomplish progressive goals for improving aspen communities.



TREMBLINGS

NEWSLETTER & BULLETIN BOARD

Vol. 6(4), November 2015

UPCOMING EVENTS

Aspen Webinar Series—The WAA will continue to partner with Utah State University Forestry Extension to offer aspen-related webinars in 2016. Watch for periodic messages from the WAA or check our website for announcements.

Taking the WAA to the Field—Have an idea for a field trip? Perhaps the WAA is not addressing issues in your area? Or maybe you know of just the right location for a field retreat, where aspen topics are clearly illustrated or management plans are underway? If you have a compelling idea and/or just the right audience to host an aspen field workshop please let us know! This is the time of year to begin planning for summer 2016. Advertise your own workshop or partner with the WAA to start planning now. Contact the [WAA Director](#) to get things started.

COMMENTARY

Fontenelle Wildfire: Partnership Success Story

Jill Randall, Terrestrial Habitat Biologist, Wyoming Game and Fish Dept., Pinedale, WY



In 2012, drought conditions and years of fire suppression resulted in the 64,000 acre (25,900 ha) Fontenelle wildfire on the east slope of the Wyoming Range in western Wyoming. This fire included portions of Bridger Teton National Forest (BTNF), Bureau of Land Management (BLM), State of Wyoming, and private land. Prior to containment, managers realized an opportunity to turn this natural event into a positive action to benefit habitat for many years to come. We chose to manage resources post-wildfire as if it were a prescribed action, including coordination with federal grazing permittees in 11 allotments to

ensure rest in the two years after the wildfire. Other activities included rebuilding over 15 miles of fence to manage livestock in future years, as well as undertaking significant weed control.

Conifer and aspen communities were the primary areas burned by this wildfire. Managers knew that aspen would likely sucker prolifically after the fire in areas that previously contained aspen, but browse levels from wildlife and livestock needed to remain low if the sprouts were going to survive. The BLM agreed to delay livestock grazing until vegetation objectives were met, as opposed to simply waiting two years. The habitat managers were most concerned about aspen, so objectives were developed based on monitoring data from previous fires in the region. The objectives that were agreed upon included, 1) Obtain at least 10,000 aspen stems/acre < 6' tall (24,471 stems/ha; < 2 m); 2) Browsing limited to 30% or less of all current-year terminal leaders of aspen; and 3) Obtain total basal ground cover of > 60%. Although the permittees generally preferred two years rest to make concrete operational plans, they were willing to go along with this plan to return when objectives were met because alternative pasture was provided if necessary. After one year of monitoring, the objectives were met in one allotment. When the permittees were told about this opportunity to return to their allotment, they volunteered a second year's rest to maximize the restoration. Managers from multiple agencies involved were very encouraged about the way the partnership and education efforts had resulted in landscape improvements after the wildfire.

All of these actions were made possible because the following groups came together to find solutions, utilize one another's strengths and resources, and acquire funding: BTNF, Pinedale BLM, Wyoming Game and Fish Department (WGFD), Sublette County Conservation District, Sublette County Weed and Pest, Natural Resources Conservation Service, University of Wyoming Extension, and the grazing permittees. Funding was provided for alternative pasture, rebuilding fence, and weed control by: Wyoming Wildlife Natural Resources Trust, Sublette County Commissioners, Wyoming Landscape Conservation Initiative, WGFD Trust



TREMBLINGS

NEWSLETTER & BULLETIN BOARD

Vol. 6(4), November 2015

Fund, Wyoming Governor's Big Game License Coalition, Rocky Mountain Elk Foundation, and the above agencies. Coordination between federal, state, and county government agencies and livestock permittees can be challenging. However, we decided to focus on the common goal of full restoration of the burned area which resulted in great benefits for local aspen communities.

WAA Creates

New Feature! "WAA Creates" will showcase creative aspen-related contributions from our members. After all, the aim of science is to inform AND inspire. We encourage fiction, folklore, poetry, drawings, paintings, photography, and other artistic expressions that may be captured in a brief-form newsletter. Please [contact the Director](#) with suggestions and/or feedback on this feature.

Seasonal admonition

I'm lightweight; I'll
shed my summer labors before you arrive.
My offering is your appeasement, a blanket for
a sleeping earth. Wholesome
re-investment, donation to a farther cause.

This won't be the season to cover up but
to be naked. I won't hunker down against your
winds. Don't forget—!
I am warmth and dynamism under your
domain. I pulse and metabolize. I churn
and respire. I'll

close my mouths and
hold my sap in tightly. I'll embrace you
seasonal foe and protest you stand against
you adapt to you
but not engage with you. I am my own.

Amy Flansburg, University of Wisconsin–Madison, PhD
Candidate, Forestry

RECENT ASPEN PUBLICATIONS

- Biggs, J.R., VanLeeuwen, D.M., Holecheck, J.L. and Valdez, R. 2010. Multi-scale analysis of habitat use by elk following wildfire. *Northwest Science* 84(1): 20-32.
- Bose, A.K., Harvey, B.D., Coates, K.D., Brais, S. and Bergeron, Y. 2015. Modelling stand development after partial harvesting in boreal mixedwoods of eastern Canada. *Ecological Modelling* 300: 123-136.
- Bachmann, S., Loeffers, V.J., and Landhäusser, S.M. 2015. Forest floor protection during drilling pad construction promotes sprouting of aspen. *Ecological Engineering* 75: 9-15.
- De Araujo, F., Hart, J.F. and Mansfield, S.D. 2015. Variation in Trembling Aspen and White Spruce Wood Quality Grown in Mixed and Single Species Stands in the Boreal Mixedwood Forest. *Forests* 6(5): 1628-1648.
- Dixon, G.B. and DeWald, L.E. 2015. Microsatellite survey reveals possible link between triploidy and mortality of quaking aspen in Kaibab National Forest, Arizona. *Canadian Journal of Forest Research* 45(10): 1369-1375.
- Doak, P. and Wagner, D. 2015. The role of interference competition in a sustained population outbreak of the aspen leaf miner in Alaska. *Basic and Applied Ecology* 16: 434-442.
- Dudley, M., Burns, K. and Jacobi, W. 2015. Aspen mortality in the Colorado and southern Wyoming Rocky Mountains: Extent, severity, and causal factors. *Forest Ecology and Management* 353: 240-259.
- Glass, J.R. and Floyd, C.H. 2015. Effects of proximity to riparian zones on avian species richness and abundance in montane aspen woodlands. *Journal of Field Ornithology* 86(3): 252-265.
- Ireson, A., Barr, A., Johnstone, J., Mamet, S., van der Kamp, G., Whitfield, C., Michel, N.L., North, R.L., Westbrook, C.J. and DeBeer, C. 2015. The changing water cycle: the Boreal Plains ecozone of Western Canada. *Wiley Interdisciplinary Reviews: Water* 2(5): 505-521.



TREMBLINGS

NEWSLETTER & BULLETIN BOARD

Vol. 6(4), November 2015

- Jeffries, M.I., Miller, R.A., Laskowski, M.D., and Carlisle, J.D. 2015. High Prevalence of Leucocytozoon Parasites in Nestling Northern Goshawks (*Accipiter gentilis*) in the Northern Great Basin, USA. *Journal of Raptor Research* 49(3): 294-302.
- Kovatch, L.C. 2015. The response of the avian community to 40 years of land cover change within the Aspen Parkland and Moist-mixed Grassland ecoregions of the Canadian prairies. Regina, Canada, University of Regina. [MS Thesis]
- Lafleur, B., Cazal, A., Leduc, A. and Bergeron, Y. 2015. Soil organic layer thickness influences the establishment and growth of trembling aspen (*Populus tremuloides*) in boreal forests. *Forest Ecology and Management* 347: 209-216.
- Latutrie, M., Mérian, P., Picq, S., Bergeron, Y. and Tremblay, F. 2015. The effects of genetic diversity, climate and defoliation events on trembling aspen growth performance across Canada. *Tree Genetics & Genomes* 11(5): 1-14.
- Madritch, M.D. and R.L. Lindroth 2015. Condensed tannins increase nitrogen recovery by trees following insect defoliation. *New Phytologist*.
- Painter, L.E., Beschta, R.L., Larsen, E.J. and Ripple, W. J. 2015. Recovering aspen follow changing elk dynamics in Yellowstone: evidence of a trophic cascade? *Ecology* 96(1): 252-263.
- Pitt, D.G., Comeau, P.G., Parker, W.C., Hoepting, M.K., MacIsaac, D., McPherson, S. and Mihajlovich, M. 2015. Early vegetation control for the regeneration of a single-cohort, intimate mixture of white spruce and aspen on upland boreal sites—10th year update. *The Forestry Chronicle* 91(3): 238-251.
- Rosenblum, A. 2015. Altered Fire Regimes and the Persistence of Quaking Aspen in the Rocky Mountains: A Literature Review. *Open Journal of Forestry* 5(5): 563-567.
- Rubert-Nason, K.F., Couture, J.J., Major, I.T., Constabel, C.P. and Lindroth, R.L. 2015. Influence of genotype, environment, and gypsy moth herbivory on local and systemic chemical defenses in trembling aspen (*Populus tremuloides*). *Journal of chemical ecology* 41(7): 651-661.
- Seager, S.T., Ediger, V. and Davis, E. 2015. [Aspen Restoration and social agreements](#): an introductory guide for forest collaboratives in central and eastern Oregon. The Nature Conservancy, Portland, OR. 64 p.
- Strand, E., Bunting, S., Starcevich, L., Nahorniak, M., Dicus, and G. Garrett, L. 2015. Long-term monitoring of western aspen—lessons learned. *Environmental monitoring and assessment* 187(8): 1-16.
- Worrall, J., Keck, A.G. and Marchetti, S.B. 2015. *Populus tremuloides* stands continue to deteriorate after drought-incited sudden aspen decline. *Canadian Journal of Forest Research* 45: 1768-1774.

CONTACT WAA:

Paul C. Rogers, Director, Western Aspen Alliance, Utah State University: [Email](#)

Wanda Lindquist, WAA webmaster: [Email](#)

Emmon H. Rogers, *Tremblings* Reviewer

Website: <http://www.western-aspen-alliance.org/>

