

# Clay's Corner for November 2022

Providing news and views from a broadcast engineers  
perspective since September 1986

I used to write how Summer was our shortest season.....Well, as we all know, that was not the case this year. Instead of the usual start of Summer (some time after the 4<sup>th</sup> of July) Summer started about the 19<sup>th</sup> of June with little or no rain until the 21<sup>st</sup> of October. For these parts, that's a very-very long run. Many are asking 'is this the new normal' Most of the experts say no, however add that climate change is indeed a factor.

One thing I have learned after living in this area for a very long time, is that you can depend on rain. The annual 'Wet' was projected to start as abruptly as summer began on the 21<sup>st</sup> of October with forecasters saying that we have a number of, classic, weather systems staging to march through our area.

Looking waaaaaay back. On Oct 12<sup>th</sup> I was listening to KNWN on my way to Mt Vernon and heard a story they ran about the Columbus Day Storm of 1962 and how it took place - **SIXTY** – years ago. I was quickly hit with a flood of memories. They say we are likely to remember where we were during a significant event (The Kennedy shooting etc). This was no exception. I was employed at a little radio station in Lakewood (KFHA)...Having started there a year earlier. The station did not have a generator and did not get its power back until shortly after noon at which time we had collected a lot of damage reports from the Lakewood area that was particularly hard hit due to it's large quantity of tall evergreens. I was 'jolted' to think about the fact that I have been doing this 'broadcast stuff' now for over 61 years! This must be some kind of record?

Perhaps this is a good place to mention an up-coming change in what I have been doing ...

Steven Allen (Legend of Vashon) will be moving to a full-time position with Bonneville Radio in Seattle on the first of the year. This change will end my 40-year association with 97.3 FM, the last 12, or so, years as a contractor. My time there goes back to when the stations was KNBQ in Tacoma where I was the Chief Engineer. During all this time I worked for the Tacoma News Tribune (original owners) Viacom, Entercom and finally Bonneville. The highlight of my time with this station was making it the first broadcast station on West Tiger Mountain in 1987 and seeing that site selection be chosen by a dozen other stations. Going forward, Steven Allen and Josh Harstad will be able to experience West Tiger as so many have before. (Let's see what this winter has in store 😊)

I will still be going to West Tiger (And Cougar Mt) on a regular basis as I plan to continue to work for American Tower and KING-FM in addition to my duties with NWPB.

Looking back at this past summer I have collected a number of items to share –

We had a lot of records set in October as summer rolled on....The most, above 80 degree days, the first time we've had back to back 80 degree days etc. etc.

Not only was it much hotter than normal – it was record setting dry. By the 18<sup>th</sup>, the City of North Bend was gearing up for water rationing. (Tell that to folks from elsewhere who are convinced that it rains all the time in Seattle)

Thanks to the high temps and lack of rainfall, the number of forest fires in Western Washington was increasing the smoke level. You could look up and see blue skies and the sun, but looking horizontally you saw a brown haze and smell.

On October 19<sup>th</sup>, it was reported that Seattle had the worst air – IN THE WORLD. Apparently, many tourists were shocked at the situation.

I drove back and forth from Auburn to Mt Vernon that day and...yes, it was very bad. (Reminder to self – Change the Cabin Air Filter in my truck) I found that everything was gaining a layer of brown dust. The hood of your vehicle was a great collector of the stuff. So were air filters. The following is a picture of an air filter from KMWS in Mt Vernon. Note the color on the left side. That's the same hue as the air and ash we have been breathing.



Air Filter sales in this area should be booming as a result. I will be changing filters on all the stations equipment I look after. Whatta mess.

Another aspect of all the smoke was that many were reporting a sore-throat and other respiration issues. For those that were forced to work outside, it was just plain hazardous. A piece in the Seattle Times suggested that we now have – FIVE Seasons – The 5<sup>th</sup> one to be called ‘Smoke’. For those of you that are new to the area, this is a ‘new’ season. In years past we were not plagued with smoke from fires either in our mountains or from as far away as California. Yes, this appears to be a ‘new-normal’

Here’s what the Clean Air Agency was reporting -



## Air Quality Notifications

Friday, Oct 14:	102 AQI	Unhealthy for Sensitive Groups	<b>Orange</b>	Particle Pollution (2.5 microns)
Saturday, Oct 15:	102 AQI	Unhealthy for Sensitive Groups	<b>Orange</b>	Particle Pollution (2.5 microns)

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### Extended Forecast

Sunday, Oct 16:	102 AQI	Unhealthy for Sensitive Groups	<b>Orange</b>	Particle Pollution (2.5 microns)
Monday, Oct 17:	102 AQI	Unhealthy for Sensitive Groups	<b>Orange</b>	Particle Pollution (2.5 microns)
Tuesday, Oct 18:	102 AQI	Unhealthy for Sensitive Groups	<b>Orange</b>	Particle Pollution (2.5 microns)
Wednesday, Oct 19:	102 AQI	Unhealthy for Sensitive Groups	<b>Orange</b>	Particle Pollution (2.5 microns)

All the smoke produced some very unusual sunsets where the Sun turned into this big 'Red Ball'. The following picture, taken from my deck overlooking Auburn was typical.



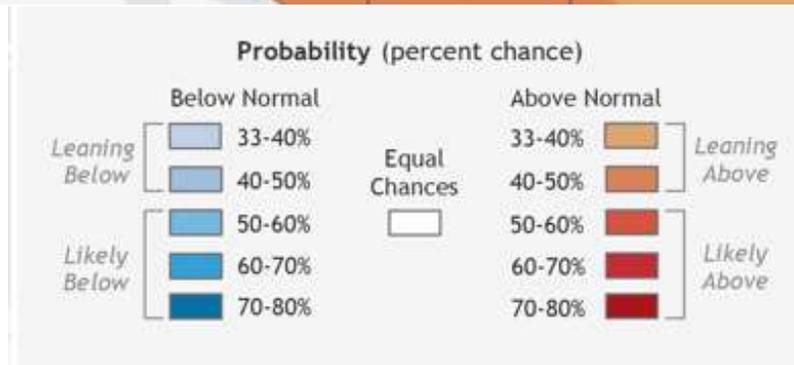
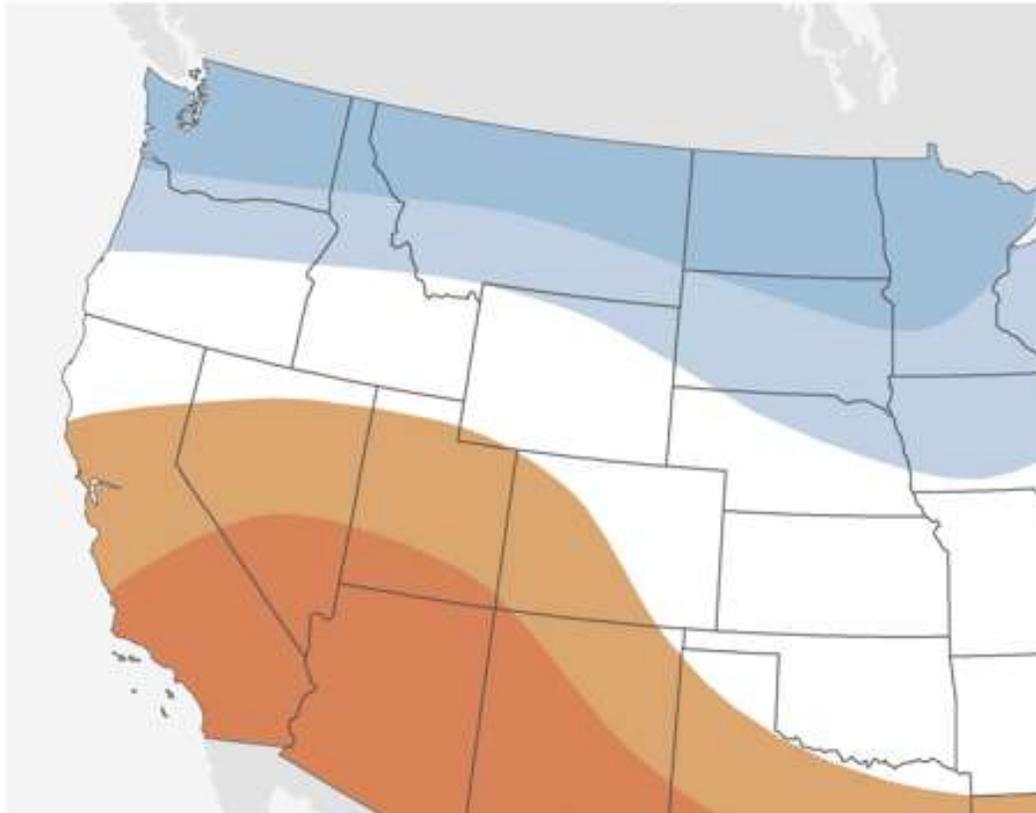
On top of all of this, it got hot on the 16<sup>th</sup> with Seattle setting an all time record high of 88 degrees. We've never had temperatures like this in October before.

Then, as predicted, on October 21<sup>st</sup>, the winds shifted, the clouds rolled in and IT RAINED. And it got a lot cooler. Instead of being in the 80's we were in the low 50's. The forecast was then calling for snow in the higher passes. So what will go into the record book as one of the longest summers in history is over.

One thing I have learned about this part of the country, the weather can be hot, smokey and dry...But the rains will eventually come and we will again have good air to smell and breath.

NOAA Climate Prediction Center recently released this item regarding how temperatures 'might' be this winter – Looks like our hotter than normal Summer is going to be replaced with a colder than normal winter...and, looking at the next map – A wetter one.

## Winter 2022-23: U.S. Temperature Outlook



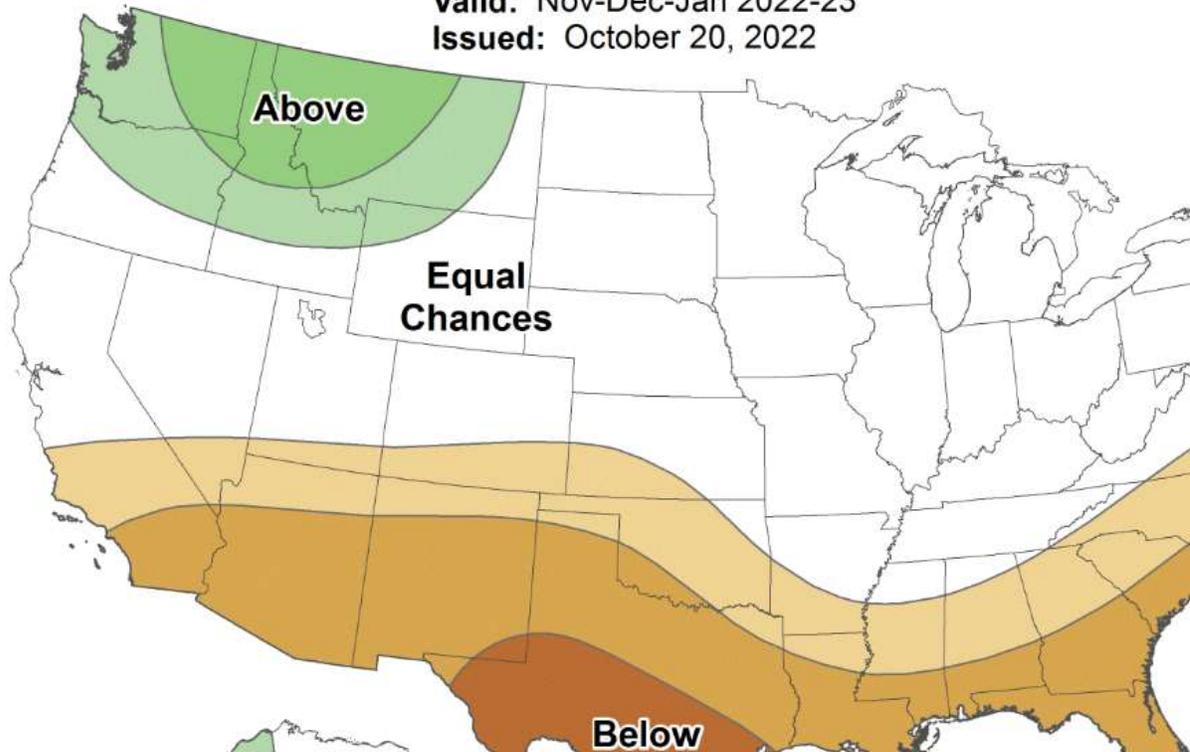
NWS Climate Prediction Center  
Map by NOAA Climate.gov



# Seasonal Precipitation Outlook

Valid: Nov-Dec-Jan 2022-23

Issued: October 20, 2022



This, hopefully, good news for precipitation in the middle of the country that's experiencing the Mississippi River setting record lows. Not good news for Southern California and Arizona however. Meanwhile good news for us as NOAA's official round of predictions favored cooler temperatures and above-average snowfall in the mountains this winter. Great news for our snowpack and those that depend on snowmelt next spring and summer....And, perhaps, not good news for those of us that have to work on mountain-top transmitter sites.

As you know, I dislike those that spread mis-information and conspiracy theories. This one, regarding the recent hurricane in Florida, thankfully, appeared to die pretty quickly. Maybe there is hope? I was saddened to read that our twisted politics have stooped to another low. A group of Republican's are accusing the Democrats of creating the hurricane using 'weather control technology' to make the Republican Florida Governor look bad. (I am not kidding). If the Democrats have this technology, why don't solve the water shortage in the Southwest by making it rain there so they could be viewed as hero's. Sounds to me that the anti-science/conspiracy theory group is still hard at work.

If you were like me – you elected to save a lot of money and not try to keep your lawn green though all of this. If you are looking at an alternative – How about clover? Clover doesn't need much water or mowing, stays green and fertilizes itself!

<https://www.marthastewart.com/8322420/clover-lawns>

I've been working at West Tiger Mountain now since 1987. In all that time I've noted a couple of things going on up there that were not the case back in '87. The first one is how Scotch Broom managed to start growing up there. There is a lot of it along our freeways. It becomes quite noticeable when it blooms with its bright yellow flowers. No one has complained, yet.

[Scotch Broom | National Invasive Species Information Center](#)

This year, for the first time this summer, I noted a large amount of what are commonly called 'Stink Bugs' at the West Tiger Transmitter site. Guess they are becoming quite a problem, nation-wide. Here's a picture I took of one next to the entry door of the transmitter building recently



If you want to know more about them - [Stink Bug Control Info: How to Get Rid of Stink Bug \(pestworld.org\)](http://pestworld.org)

I found the brand of this product interesting –



Perhaps it was good that Harris, a major manufacturer of Broadcast Equipment, changed their name to Gates Air ?

The proposed sale of Tegna (KING and KONG-TV in Seattle) sale to Standard General for \$5.4 Billion is getting the attention of some in Congress who, reportedly, have concerns with the idea saying – They are concerned the proposed Tegna buyout would violate the Federal Communications Commission mandate and the transaction “would stretch the limits” of the FCC’s ownership rules. We will have to wait and see how this one pans out.

Audacy has been among the radio broadcasters most aggressively pushing into podcasting. But facing financial pressure, the company is reportedly exploring a potential sale of its biggest podcast asset. Audacy has hired the investment firm Evolution Media Capital to shop Cadence13 according to Axios, which cites three sources familiar with the process. But what is reportedly not for sale are the other Audacy-owned podcast studios.

The Company, formally known as Entercom, has see their stock price hovering near 30 cents. You can read all about it by searching their Stock Symbol – AUD.

Job Opening at KOMO! (This item landed in my In-Box via Linked In)



**John Reynolds** · 1st  
Chief Engineer at Sinclair Broadcast Seattle (KOMO)  
Seattle, Washington, United States · [Contact info](#)  
500+ connections

28 mutual connections: Dave Ratener, Terry Ryan, and 26 others

[Message](#) [More](#)

**Activity**  
757 followers

John Reynolds posted this · 3d

KOMO has an immediate opening for an IT Technician. If you are someone you know is looking for a change this is a great opportunity.

 Sinclair Broadcast Group  
 Lake Washington Technical College

The RTDNA recent conducted an online survey among 2,000 weekly local news customers this question – ‘Can local radio’s newscasts, and new of talk programs, be trusted?’

The answers were interesting –

- 51% of listeners to a local radio stations newscasts or programs said they trust the source ‘a lot’ .....41% said somewhat
- 58% trust local TV newscasts ‘a lot’

As expected, the trust a lot level is not the same between Democrats and Republicans

- Democrats – 60%
- Republicans – 48%
- Independents – 39%

Perhaps recognizing there is some work to be done in this area, the RTNDA is recommending some trust-building strategies for all local news sources going forward.

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Very pleased to see the FCC getting more aggressive about automated Robocalls. In the most recent case, they are getting tough with cellular carriers for their lack of customer protection.

I don't know about you, but I am still getting – A LOT- of text messages telling me there is suspicious activity with my \_\_\_\_\_ account and that I need to contact them immediately. This is the text-version of the verbal robocalls I used to get. All of them have the same goal – Get you to believe that if you give them your personal information they can make things OK again. The scary part of all of this is there are likely thousands of 'suckers' that fall for their scheme who help make it a viable source of income.

The FCC recognizes that just fining a carrier is not enough to get them to comply, now they are telling them they could be denied access to the cellular network, effectively putting them out of business.

Time to look at the Radio Ratings –

The headline this month is that KIRO-AM came in #1 presumably with a lot of help from the Mariners that made it into the playoffs for the first time in ages. I remember, back in the last century, when KIRO-AM was #1 for other reasons. Perhaps this underscores the comment that it's all about content? KIRO-FM was #3. Bet there were some interesting conversations at 1820 Eastlake when this came out.

Little KEXP (The station with a fraction of the coverage of the 'big-boys' was #4

Another AM Radio headline came from California where San Francisco's KGO ditched their long running news/talk format for something to do with Sports Betting. Their new slogan is 'The Spread' (Don't think they mean Mayo) Before 820 became populated by a local station, you used to be able to hear KGO very well in the Seattle area after dark. This was due to their great transmitter site located in the south end of San Francisco Bay with 50,000 Watts and north-aimed directional array. Going to be interesting to see how this new format works out....Certainly there are a lot of eyes on it. If it gains traction, you could well see one of these in the Seattle market. I sure there are some 'cellar-dwelling' AM's that would love to be able to do something other than lose money.



Xperi (the company behind HD Radio) and Hubbard (Who own a cluster of stations in the Seattle market) have just completed testing some modifications to the FM version of HD Radio. Reportedly they are doing this by increasing the bitrate of the data stream that's used for HD. From what I read, this will not add more music or wide-band applications, like HD2 & HD3 but rather increasing the ability of HD Radio to carry digital information that could be leased to data customers. I'm sure there will be more out on this in the trades. When HD first came out, it was thought that 'data-casting' was going to be the major user of the excess capacity. As it turned out, adding a 2<sup>nd</sup> audio channel turned out to be more viable and popular.

Once again, Broadcasting, took a beating from that big hurricane that struck Florida. Some stations were able to stay on the air, while others sustained damage and were forced off.

One group, in Ft Meyers, saw all their radio and TV operations flooded out, they were finally able to get some stations back on the air operating from a transmitter site.

As in a lot of situations like this – Radio was a life-line for many for the simple fact that there are so many battery (or hand-crank) radios out there. Many Radio operations lack news departments to ingest information, this is where TV stations come in. In many cases radio stations simply re-broadcast the TV news broadcasts. In 'Hurricane Country' these partnerships are established, well in advance and this fact it broadcast in the days ahead of the arrival of the storm. One day, when we have our 'Big-One' the Seattle area will likely be facing something similar.

Podcasting is a fairly recent addition to our vocabulary. Its reported that Podcasts are now listened to by close to 125 million Americans each month or over 98 million who listen weekly reaching about 30% of the population. No wonder you hear so much about it.

This item came from Chuck Maylin, who was the GM at KBSG. Nice to know that I was remembered in this way. He and I also worked together at KMO way back in the last century.



A bit of AM Radio history involving 1480 –

Way back in the last century, a group called 'Ferguson and Hall Associates, went on the air in the Tacoma Suburb of Lakewood as KFHA (Call letters reflecting the owners name). They constructed the transmitter site, using a 2-Tower directional array and 1,000 watts, day-time only, between Western State Hospital and Steilacoom.

The 1480 antenna pattern was squeezed in between a couple of historic stations – KELA on 1470 in Centralia and KBRO on 1490 in Bremerton.

Studios were in a building adjacent to the, then new, Villa Plaza shopping center (demolished in recent years to become the Lakewood Towne Center). Back in those days, you could not remote control directional AM's, so there they had to employ a person to watch the transmitter while the announcers and studios were at the Villa Plaza in what was called the 'Tiki' building. Named for a restaurant under the same roof.

The economics of this arrangement did not pan out and the station went dark, only to go back on the air (from the transmitter site) several times under various owners. Finally it was purchased by Ralph Burden and went on the air on August 1, 1961 from an enlarged transmitter building. (This was when I started my first full time job in the business) The station had a pretty good 4+ year run with a popular Country format. This too came to an end and the station was on and off several times. Along came Clay Huntington, who owned KLAY-FM, picked up the license and put the station back on the air as KLAY from a re-located transmitter site just north of Lakes High School. Clay moved his operation to 1180 (as a full timer) and 1480 returned to its pattern of being on and off. In the end, the property owner where the transmitter was located passed away and his family elected to sell the property. Today, there are streets and homes where there were once towers. Many efforts were made to find a location for the 1480 towers, to no avail.

Fast forward to the present time – The owners of Bremerton's KBRO are taking advantage of the situation and are planning on moving KBRO, which was operating on 1490 with 1000 watts, non-directional full time, to 1480 where they propose to increase power to 5,000 watts day time and reduce power to 12 watts at night.

I've left out a many of the multiple stops in the 1480 Story. To include them all would require some deep research and a LOT of space. In the end, 1480 will live on (at least for a while) in Bremerton. 1490 will be silent, at least during the day. At night there are a zillion signals all competing with each other....But that's another story.

Digital radio stations could get their first, fully authorized, power increase in more than a decade if the Federal Communications Commission goes along with a proposal from HD Radio developer Xperi and the NAB. In a joint filing, the two entities are asking the FCC to adopt an updated formula to determine FM power levels. They say the revision is based on “real world operational experience” that has been gained since the FCC last approved a power increase in 2010.

In a filing heavy on engineering jargon, Xperi and NAB say during the past 12 years concerns have developed about the current approach for power measurement. As currently written, FCC rules allow all digital FM stations that meet certain guidelines to operate at ten percent of analog power. The rules do allow some stations to exceed that on a case-by-case basis, as long as they are armed with evidence that the power boost does not cause interference to adjacent channel analog signals.

“The current formula overstates the potential for digital interference and has constrained stations from increasing power, which has constrained digital service,” Xperi and NAB say. The companies argue that the past decade has shown that the formula is “too restrictive” and overstates the level of protection analog stations require. They also say the approach assumes symmetric rather than asymmetric digital sidebands. “The use of symmetric sidebands for all calculations eliminates a viable path for many stations to increase power on at least one sideband, which would improve digital coverage,” the companies say.

Here in the Seattle market, KING-FM has been operating asymmetrical HD for several years with -10 & -14 power levels. They are ‘technically’ doing this experimentally and file with the FCC a letter stating how the ‘experiment’ is going. Hopefully, this will move to something that can be ‘formally’ authorized in the near future.

To prove more power can work, Xperi and NAB worked with engineers at Audacy and iHeartMedia to examine a number of short-spaced stations. They found several cases where digital stations were already operating at the power level now being sought, and despite their elevated power there have been no well-documented reports of interference by any of those stations.

From the ‘Did you know department –

According to [Reliable Plant Magazine](#), electric motors account for 60 percent of industrial power consumption in America, according to the [Karlsruhe Institute of Technology](#), the first electric motor was invented in 1834—44 years before the light bulb.

When you hear about the Society of Broadcast Engineers, perhaps, you think of an organization comprised of members living in the U.S.? This news item may change your thinking –

### **New SBE Chapter Formed for Eastern European Countries**

**The Society of Broadcast Engineers (SBE) has announced that the SBE Board of Directors have approved the creation of a new chapter serving Eastern Europe. "While specific systems and broadcast rules vary around the world, broadcast engineering skills in general are common regardless where one works," said SBE president Andrea Cummis, CBT, CTO. "The SBE has had a chapter in Hong Kong for several years, and we welcome our newest members in Eastern Europe."**

NAB announced the 2022 Marconi Award Winners, and, as per usual, no winners in this neck of the wood. KTAR-FM in Phoenix won Legendary Station of the year.

Something you don't hear about very often – A Non-Commercial station having a walk-out. Happened at KUOW where union members are demanding what they term 'Fair Wages'

Perhaps another 'sign of the times' - Homeless setting up camp at a transmitter site – in this case, Pigeon Point in West Seattle – (Picture courtesy of Stephan Lockwood – Hatfield & Dawson)



Could Vashon be next ?

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As you likely know, we have been having issues with the supply of chips. This has resulting in delays in manufacturing of everything from vehicles to broadcast equipment. Another factor in this situation is the fact that the worlds largest chip maker, TSMC, is located in Taiwan which is a focus of concern due to their standoff with China. Should that situation 'go-sideways' it could have a major/negative impact on many things costing the global economy trillions.



The US commerce secretary said the US would face a "deep and immediate recession" if American businesses no longer had access to these chips.

The US is trying to become less reliant on Taiwan. In July Congress pass the 'CHIPS Act' whose goal is to increase chip manufacturing in the US. Micron, based in Boise, is one of the major chip makers in the PNW who is building a chip factory in upstate New York. Others, including Intel and Samsung are building new plants as well. TSMC, is playing it safe by building new facilities in Japan and the US. These new plants take years to get up to speed, however.

Over the years we have all become increasingly reliant on things being manufactured in other countries. Apparently the initial reason was to lower the cost of production. Not always the case these days as a lot of things are created in far away places that were never made here.

Interestingly, I have a piece of test equipment that was built in the Ukraine.

In past Column's I have asked for pictures. This month, Mike Gilbert sent me some of a new tower being constructed on Mt McClure, a 4560 foot site near Winthrop.

KCSY-FM is in the green building on the left and KOZI-FM translator is in the rust colored box on the right. You can see the, partially constructed new tower just to the left of the crane.





Another view of the site with the new tower to the left of the big crane.



I went looking for pictures of the site, on-line, and found these -

The following one is the way the site looked prior to the erection of the new tower.



The next one is of Mt McClure, from a distance, in the Methow Valley



The FCC is considering revisions to their EAS Rules with the goal of protecting the EAS from Cyberattacks. I'm not going to dig into the details here, however, let's say this proposal has stirred up considerable interest. If you are in Washington State, I highly recommend that you get involved with our SECC as they are likely to file comment with the FCC. Best way to do this is by subscribing to the WA-PAWS Remailer hosted by WA-State Emergency Management. You can also look into the matter by referencing PS Docket No.22-329.

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As you likely noticed, a lot of broadcast related things are celebrating 100 years in business. WSU is no exception....They too are celebrating 100 years. Here are some highlights of their long history –

- May 15, 1922 the WSC president asked the Board of Regents to approve a radio station. In June of that year, Secretary of Commerce, Herbert Hoover, granted the request.
- December 10, 1922 – The Station went on the air as KFAE
- 1925, the Call Letters were changed to KWSC
- 1928, one of their most famous students, Edward R Murrow is on the air at KWSC
- 1962 , KWSC-TV goes on the air from Pullman.
- 1969, Call Letters change – Radio becomes KWSU and TV becomes KWSU-TV.
- 1970, NPR is born and KWSU is a charter member station.
- 1986, KWSU has expanded to a number of FM Stations under the name of Northwest Public Radio.(NWPR)
- 2018, the effort was renamed Northwest Public Broadcasting or NWPB

Perhaps I should add, I've been a part of NWPB since about 2010.

The following pictures come from Jason Royals at NWPB. The first one here is of the KOHO Transmitter site near Wenatchee. The KOHO Antenna is the 4-bay just over the middle of the building.



KOHO operates with 950 watts (ERP) on 101.1 and is licensed to Leavenworth. Their coverage includes Leavenworth and Wenatchee. The transmitter site is Blag Mountain.



Next are a couple of 'view shots' from the KOHO transmitter site – Beautiful country !



A couple of shots from my camera....First, looking up the road to Middle Tiger Mountain late in the afternoon on October 7<sup>th</sup>. I was standing in the shadows looking up the road being lit by a brilliant ray of sunshine, below, a sunset from my deck overlooking Auburn



If you have a picture to share- Please send it my way !!

Daylight saving time ends this year on Sunday, Nov. 6, at 2 a.m. That's about eight months after the Senate unanimously voted to keep the US in daylight-saving mode all year long.

And, from the funny sign department –



Hope to catch you here next month...In the mean time  
Happy Thanksgiving !!!

Clay, K7CR, CPBE  
SBE Member # 714  
Since March 1968