

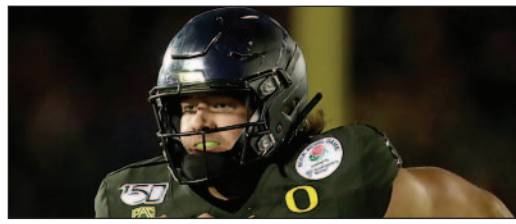
World: Fire at German zoo kills 30 animals. A2



Local: Bay Area welcomes first babies of the new year. B1



Sports: Herbert leads Ducks past Badgers in Rose Bowl, 28-27. C1



Business: Drug costs up as new year begins. C7



The newspaper of Silicon Valley

The Mercury News

BayArea NewsGroup 111

Volume 169, Issue 197

THURSDAY, JANUARY 2, 2020

24/7 COVERAGE: MERCURYNEWS.COM » \$1.50

SCIENCE

LAWS LIMIT CANNABIS RESEARCHERS' WORK



PHOTOS BY RANDY VAZQUEZ — STAFF PHOTOGRAPHER

Bryce Berryessa, owner of TREEHOUSE Cannabis Dispensary, holds up a strain of cannabis flower named Garanimals at his shop in Soquel on Sunday.

Scientists must obtain hard-to-get license from DEA in order to conduct research

By Ashleigh Papp
Correspondent

It used to be a wild weed of unknown ancestry, grown surreptitiously in the rural fields of Latin America and smuggled across the U.S.-Mexico border. But Americans, without knowing what was in the drug or its effects on the brain and the rest of the body, still consumed it with abandon.

Today, two years after recreational marijuana became almost as easy for California adults to buy as Snickers bars — and a quarter-century after voters decided to make the Golden State the first to legalize medical marijuana — cannabis is big business. It's grown under meticulous conditions, heavily taxed and highly regulated.

Yet, scientists say, in many ways it remains a mysterious drug.

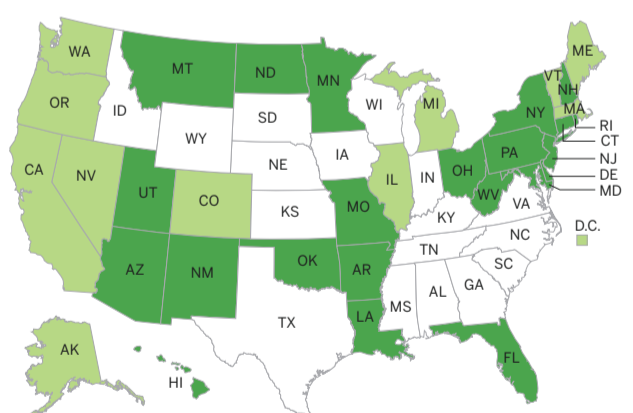
Researchers are anxious to learn more about marijuana's genetic and chemical makeup, its medical benefits and the public health risks associated with increased use of the drug. But a maze of often contradictory federal and state regulations limits how scientists can



Andrew Salo smells some of the cannabis flower at TREEHOUSE Cannabis Dispensary in Soquel on Sunday.

WHERE MARIJUANA IS LEGAL IN THE U.S.

- Medical marijuana legalized
- Marijuana legalized for recreational use



Source: Governing.com

BAY AREA NEWS GROUP

put the plant under a microscope.

The scientists' biggest challenge is this: Cannabis is not only illegal under federal law, it's also classified as a "Schedule I substance," meaning that the U.S. government equates it with heroin and other hard drugs that federal officials say have a high potential for abuse and no "currently accepted" medical uses. That means that unless scientists apply and receive a hard-to-get license from the U.S. Drug Enforcement Administration to do cannabis research, they are severely restricted.

"The federal system seems set up to have cannabis researchers fail," said Jahan Marcu, co-founder of the New York-based International Research Center on Cannabis and Mental Health.

Interest in cannabis research has soared as the number of users steadily increases, mainly as a result of two-thirds of U.S. states loosening their marijuana laws.

At universities that receive federal funding, anything that involves handling

MARIJUANA » PAGE 5

SAN JOSE

Residential burglaries continue sharp drop

Violence is still trending upward, as the city's overall crime rate outpaces state and national rates

By Robert Salonga

rsalonga@bayareanewsgroup.com

SAN JOSE » In the five years since San Jose crime — and property crime in particular — took center stage in a contentious mayoral election, the city has seen a sharp drop in home burglaries, even as violent crimes have continued a steady crawl upward.

Home burglaries in San Jose decreased by nearly 40 percent between 2014 and 2018, largely

due to a combination of police prioritization and the proliferation of affordable home-security cameras, according to figures furnished by the San Jose Police Department and FBI. That trajectory appears to have continued in 2019, though total statistics for the year are not yet final.

Police Chief Eddie Garcia said the department has placed increased emphasis on property crimes

— including the 2018 revival of its dedicated Burglary Prevention Unit — based on the knowledge that they are among the most common crimes experienced by San Jose residents. By targeting burglary crews, he said, police can have an amplified effect on curbing the problem.

"A hundred different burglaries are not committed by a hundred different people. When we take these crews off the street, we drive down far more burglaries and robberies," Garcia said. "We'd like to drive down that number even more."

The decline in home burglaries is poised to be a bright spot amid an uptick in violent crimes — about 3 percent — in 2019, driven largely by a continued six-year rise in aggravated assaults, which were on pace to increase 15 percent above

CRIME » PAGE 5

ANALYSIS

Iran and North Korea challenge Trump's diplomatic control

By David E. Sanger

The New York Times

President Donald Trump entered the new year facing flare-ups of long-burning crises with two old adversaries — Iran and North Korea — which are directly challenging his claim to have reasserted American power around the world.

While the Iranian-backed attack on the U.S. Embassy in Baghdad seemed to be under control, it played to Trump's longtime worry that American diplomats and troops in the Middle East are easy targets and his longtime stance that the United States must pull back from the region.

In North Korea, Kim Jong Un's declaration on Wednesday that the world would "witness a new strategic weapon" seemed to be the end of an 18-month experiment in which Trump believed his force of personality — and vague promises of economic development — would wipe away a problem that plagued the last 12 of his predecessors.

The timing of these new challenges is critical: Both the Iranians and the North Koreans seem to sense the vulnerability of a president under impeachment and facing reelection, even if they are often clumsy as they try to play those events to their advantage.

The protests in Iraq calmed on Wednesday,

TRUMP » PAGE 5

OBITUARY

Former NBA Commissioner Stern dies at 77

The basketball-loving lawyer oversaw the organization as global powerhouse

Staff and wire reports

David Stern, the basketball-loving lawyer who took the NBA around the world during 30 years as its longest-serving commissioner and oversaw its growth into a global powerhouse, died Wednesday. He was 77.

Stern suffered a brain hemorrhage on Dec. 12 and underwent emergency surgery. The league said he died with his wife, Dianne, and their family at his bedside.

"The entire basketball

community is heartbroken," the National Basketball Players Association said. "David Stern earned and deserved inclusion in our land of giants."

The Warriors released a statement calling him a "visionary and innovator in every sense of the language." The team also sent out video clips of a few of its leaders speaking to Stern's impact.

"I think David Stern made probably a bigger impact on the game than any non-

STERN » PAGE 8



THE ASSOCIATED PRESS ARCHIVES

David Stern, who spent 30 years as the NBA's longest-serving commissioner and oversaw its growth into a global power, has died on New Year's Day, Wednesday. He was 77.

NEWS ON YOUR PHONE

Download the Mercury News mobile app for iPhone or Android.

INDEX

BusinessC7
Classified B8,9

Comics/TV B10
Lottery A2
Obituaries B7

Opinion A6
Puzzles B5, C6
Weather B12

WEATHER

H: 60-62 L: 41-42
Full report on B12



MediaNews Group
Subscribe:
MercuryNews.com
©2019



Marijuana

FROM PAGE 1

cannabis requires a license from the DEA. The application, Marcu said, is extremely difficult to complete, and it often takes several years for the government to approve it. As a result, most scientists teaching or researching cannabis today are forced to rely on textbooks, online resources and expert-led webinars.

“The lack of information is astounding for a new marketplace,” said John Yoder, a professor of plant science at UC Davis who teaches students about cannabis without a DEA license. “It’s easier for me to get a license to make methamphetamine than to grow cannabis.”

Agricultural scientists say one reason more cannabis research is so badly needed is that modern horticultural techniques have created a plant far different from the way weed grows in the wild.

Yoder noted that when cannabis was illegal across the U.S., it was often grown in pots so that it could be easily moved. And, he added, it was grown as big as possible to yield the most product.

“The result is a plant shaped like a Christmas tree,” Yoder said.

A more efficient way to grow weed, he said, would be to cultivate shorter



Canisters with different strands of cannabis flower are displayed at TREEHOUSE Cannabis Dispensary in Soquel. Scientists are anxious to learn more about marijuana, but federal and state regulations are limiting their research.

RANDY VAZQUEZ
STAFF PHOTOGRAPHER

plants that are covered entirely with buds — “like a little rosebush.” With agricultural science, Yoder said, the time it takes to grow marijuana can be reduced and its adverse effects on the environment — including a heavy reliance on water and pesticides — can be lessened.

“There’s a huge number of opportunities as soon as plant scientists can get their hands on this plant,” Yoder said.

A spokesman for the U.S. Food and Drug Administration, which works with the DEA in enforcing cannabis laws and rules, declined to comment for this story but pointed to the FDA’s 2016 denial of a petition to remove cannabis from the worst-drugs list: “The drug’s chemistry is not known and reproducible; there are no adequate safety studies; there are

no adequate and well-controlled studies proving efficacy.”

The medicinal properties of cannabis have been fiercely debated for decades. Some scientists say the plant and its derivatives can be used to treat ailments ranging from cancer and epilepsy to toe fungus, while others argue that it can lead to a loss of mental acuity and even psychosis.

“There are so many healing benefits with cannabis — it can alleviate PTSD symptoms, chronic pain, seizures, migraines and more, but everyone’s body is different,” said Jeremy Freitas, a U.S. Air Force veteran from Napa County who co-founded the Veterans Cannabis Group in 2016 to help vets who use medicinal marijuana. And “we want to know where it’s coming from and that

it’s without pesticides or heavy metals.”

At UC San Diego’s School of Medicine, the Center for Medicinal Cannabis Research receives \$2 million in annual funding from California’s Proposition 64, the 2016 ballot initiative that legalized recreational marijuana. And because the center has a DEA license, it has received roughly \$7 million in federal grants from the National Institutes of Health since the center was founded two decades ago.

The center’s co-director, Thomas Marcotte, is now experimenting with marijuana with various levels of THC — the crystalline compound in the cannabis plant that gives users their high — to treat lower back pain caused by nerve damage. Some participants are receiving cannabis, while others get a placebo that looks

and tastes like marijuana. The patients and the scientists involved don’t know who is getting the real thing — which Marcotte hopes will minimize participants and researchers from seeing and feeling what they want to see and feel.

While the center is at the forefront of clinical-style cannabis research, its federally funded research still comes with restrictive guidelines. The center, for instance, can only use cannabis grown by the lone federally licensed dispensary, located at the University of Mississippi.

The marijuana provided by Uncle Sam, Marcotte said, is effective in that some patients experience relief from various forms of chronic pain. “But it doesn’t compare to the varieties and products currently available at state-level dispensaries,” he said. As a result, Marcotte said, he can’t say whether the government-approved cannabis is more or less effective than what’s available legally in California because it isn’t legal for the center to study the marijuana sold in dispensaries.

“There are so many questions to be answered, but right now it’s hard to do that research because of the federal prohibition,” Marcotte said.

Small private laboratories, in contrast, don’t receive federal funding and have thus operated with fewer restrictions in California since medicinal mar-

ijuana became legal under state law following the passage of Proposition 215 in 1996.

Jeff Raber, chief executive officer of The Werc Shop laboratories in Los Angeles, has been studying the chemistry of cannabis and its effect on the body for almost a decade.

In 2011, Raber and his team were among the first to begin testing cannabis samples for terpenes — organic compounds produced by a large variety of plants. Terpenes give lemons their zesty scent and purple kush, a strain of cannabis, its pine and peppery smell.

Raber and fellow scientists are discovering that terpenes are linked to other things about marijuana, including how relaxing or uplifting of an effect you get.

That’s the kind of information that guides consumers when they’re deciding which weed to pick at Soquel’s Treehouse dispensary, where “budtenders” are educated about terpenes, said Bryce Berryessa, the dispensary’s owner. And having solid research data about cannabis, he added, makes it easier to help customers with sleep problems, anxiety, seizures, headaches and other ailments.

“Two years of recreational cannabis in California has brought about a new type of consumer,” Berryessa said. “People are more knowledgeable and want a better understanding of what it is they’re consuming.”

Crime

FROM PAGE 1

2018 totals.

Issues in overall property crimes have also persisted: While total burglary numbers in the city were down 10 percent through November, the decline was driven entirely by the drop in residential burglaries — commercial burglaries, on the other hand, have increased by nearly 25 percent over the past five years.

Leaders of the Willow Glen Neighborhood Association, which has been vocal about the problem of property crime, voiced appreciation for the work performed by the police department. But association president Mitchell Ehrlich said he and his neighbors continue to be frustrated by the threat of break-ins, adding that they feel skittish walking around after dark and leaving their windows open in the summer.

“It’s not a comforting feeling when you know there’s someone driving around looking to steal something,” Ehrlich said.

De Anna Mirzadegan, the association’s treasurer, said she fields daily complaints about car and business burglaries, both in the neighborhood and across the city, and includes her own experiences among them. She recalled losing a purse to a smash-and-grab

car burglary in Almaden over the summer, and said she found evidence someone had used a crowbar to try to break into her North San Jose business just a few weeks ago.

Similar to Ehrlich, she acknowledges that police have been receptive to the problems, but said resident confidence remains tenuous.

“People don’t report these crimes because — what’s the point?” Mirzadegan said. “It takes your time and hassle, and nothing comes of it.”

Vehicle thefts and break-ins were down 21 percent in 2019, and have been bolstered by a \$750,000 in state surplus funds allocated in July.

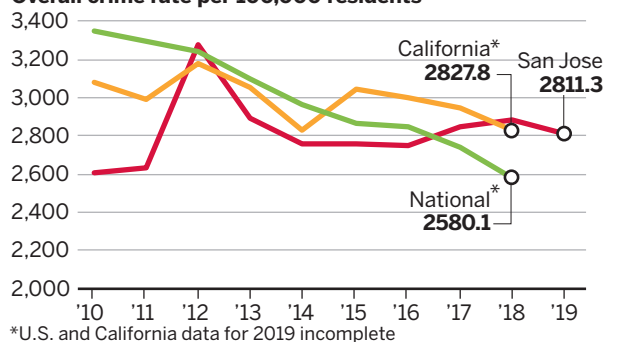
As of Tuesday, 33 homicides had been recorded in San Jose in 2019, a number that is around the average for the city in the last decade. But aggravated assaults — which crime experts say is a more telling barometer of violent crime — have been rising steadily in San Jose since 2013. And by the end of the November, the city had already seen 2,332 such incidents, already well past the 2,208 aggravated assaults reported for all of 2018.

Garcia said aggravated assaults, which encompass most forms of street violence, is one crime category that could be directly addressed by having more officers patrolling the

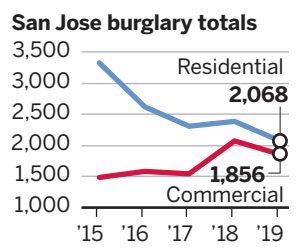
SAN JOSE CRIME

In 2019, San Jose saw a sharp drop in home burglaries continue, but violent crime is still trending upward, and the city’s overall crime rate is now outpacing both the state and national rates.

Overall crime rate per 100,000 residents



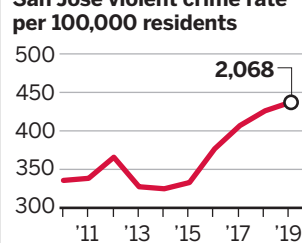
San Jose burglary totals



NOTE: All 2019 totals for San Jose are projections based on year-to-date figures provided in December

Sources: San Jose Police Dept., FBI

San Jose violent crime rate per 100,000 residents



BAY AREA NEWS GROUP

city. San Jose continues to have one of the lowest police staffing ratios among large cities in the United States, with about 10 officers per 100,000 residents as of 2018. By comparison, Oakland fields 17 officers per 100,000 residents, San Francisco has about 26, and New York City employs more than 42.

“For aggravated assaults, we need more visibility on the street,” Garcia said, “and offer that immediate

deterrent.”

The San Jose Police Department has been on a hiring surge since 2015, after the city and police union brokered a labor agreement that ended a decade of officer departures that shrunk the department by about a third. The department currently has about 1,150 officers, up from a nadir of 900 three years ago but still below its peak of 1,400 in 2008.

Mayor Sam Liccardo said

the drop in home burglaries can be credited largely to the staffing recovery.

“It wasn’t possible for officers to always take the time to do the investigation four years ago,” he said. “We are seeing fruit of our efforts in reduction of burglary and other property crime. But we have a lot more work to do.”

City leaders have also pointed to a need for police to continue to address the rising number of reported rapes and sexual assaults, which were on pace to increase by 8 percent year-over-year in 2019, after rising from 220 in 2008 to 615 in 2018.

The spike prompted the city’s five women council members — Sylvia Arenas, Magdalena Carrasco, Dev Davis, Maya Esparza and Pam Foley — to make a concerted push last year to study and fund strategies to combat that rise. Absent more data, both victim’s rights advocates and police commanders believe that the increase in sex crimes in the city can be attributed to both an actual increase in incidents as well as an increased willingness among victims to report sexual assault and rape to police.

Overall, among large U.S. cities, San Jose remains comparatively safe in terms of the sheer volume of crimes recorded — the city’s overall crime rate is projected to be around 2,800 per 100,000 residents in 2019, or about 30 percent below that of sim-

ilarly sized U.S. cities. Nationwide, the crime rate has dropped precipitously since the early 1990s, including a 25 percent decrease in the last decade. The decline has not been quite as pronounced in California over that same time period, and since 2015 the state has surpassed the national rate.

But as many San Jose residents have long made clear, there isn’t much comfort found in being reminded that they don’t live somewhere else. And police are concerned by an overall crime rate that is currently higher than both the state and national averages.

The city’s 2018 crime rate of 2,883 per 100,000 residents was 12 percent above the national rate, and 2 percent above the state rate, marking the first time since 2012 that San Jose was higher than the state average. The rate is expected to remain elevated once the 2019 crime figures are finalized.

Garcia was cautious about offering any immediate explanations for that trend.

“We are still living in one in one of the safest large metropolitan cities in the country,” he said. “Having said that, residents and the community are used to a certain kind of service from their police department.”

Staff writer Fiona Kelliher contributed to this report. Contact Robert Salonga at 408-920-5002.

Trump

FROM PAGE 1

at least for now, and Kim has not yet lit off his latest “strategic weapon.” But the events of recent days have underscored how much bluster was behind Trump’s boast a year ago that Iran was “a very different nation” since he had broken its economy. They also belied his famous tweet: “There is no longer a Nuclear Threat from North Korea.”

Today the most generous thing one could say about those statements is that they were wildly premature. Many foreign policy experts say he fundamentally misjudged the reactions of two major American adversaries. And neither seem to fear him, precisely the critique he leveled at Barack Obama back in the days when Trump declared America’s toughest national security challenges could be solved as soon as a president the world respected was in office.

The core problem may have been Trump’s conviction that economic incentives alone — choking off oil revenues in Tehran and the prospect of investment and glorious beach-front hotels in North Korea — would overcome all other national

interests. He dismissed the depth of Iran’s determination to reestablish itself as the most powerful force in the region and Kim’s conviction that his nuclear arsenal is his only insurance policy to buoy one of the last family-controlled Stalinist regimes.

“After three years of no international crises,” Richard Haass, president of the Council on Foreign Relations, wrote on Tuesday, Trump is “facing one with Iran because he has rejected diplomacy and another with North Korea because he has asked too much of diplomacy.”

“In neither case has Trump embraced traditional diplomacy, putting forward a partial or interim pact in which a degree of restraint would be met with a degree of sanctions relief.”

Trump does not engage with such arguments. He simply repeats his mantra that Iran will never be allowed to obtain nuclear weapons and that North Korea — which already has fuel for upward of 40, much of it produced on Trump’s watch — has committed to full denuclearization, even though that overstates Kim’s position.

Trump’s top national security officials, starting with Secretary of State Mike Pompeo, offer a some-

what more nuanced view, saying that over time Iran will realize it has no choice but to change its ways, and expressing optimism that “Chairman Kim will make the right decision and he’ll choose peace and prosperity over conflict and war.”

Increasingly, though, such lines sound like a hope, not a strategy. And that is Trump’s fundamental problem as he enters 2020: His diplomacy has not produced a comprehensive plan to gather the nation’s estranged allies into a concerted course of action.

The absence of a common approach is hurting the most in Iran. When Trump abandoned the 2015 nuclear deal — declaring it a “terrible” piece of Obama-era diplomacy because it did not create permanent restraints on Iran’s ability to produce nuclear fuel — his aides sounded confident that Europe, China and Russia would follow suit. They did not.

Meanwhile, the Iranians have a fine sense that “maximum pressure” campaigns work in both directions. They are vulnerable to cutoffs in oil flows. But the United States is vulnerable to highly public attacks on troops and tankers. And the attack on the outer walls of the U.S. Embassy in Baghdad, even if short-lived, was

clearly intended to send a shiver down the spine of Trump’s political aides, who remember well that a hostage crisis led to President Jimmy Carter’s reelection defeat 40 years ago.

Trump returned to a well-known stance on Tuesday, emphasizing that he did not want a war but also warning Iran that if it started one, any conflict “wouldn’t last very long.”

North Korea is a harder problem because there Trump had a diplomatic process underway, one that was both bold and imaginative. By breaking the mold and agreeing to meet the North Korean leader face to face, the first for an American president since the end of the Korean War, he had the makings of a breakthrough.

But he made key mistakes. He failed to get a nuclear freeze agreement from the North in return for the meeting, meaning that the country’s nuclear and missile production churned along while the two old adversaries returned to their old stances.

And Trump’s team, internally divided, could not back itself out of the corner the president initially put it in with his vow for no serious sanctions relief until the arsenal was disbanded. Trump did cancel joint mil-

itary exercises with South Korea — over Pentagon objections — but that was not enough for Kim.

But perhaps Trump’s biggest miscalculation was over-relying on the personal rapport he built with Kim, and overinterpreting the commitments he received from the young, wily North Korean leader.

That continues. On his way to a New Year’s party at his Mar-a-Lago club on Tuesday night, the president focused on their relationship, as if Kim’s declaration that he was no longer bound by any commitment to cease missile and nuclear testing did not exist. “He likes me, I like him, we get along,” Trump said. “He’s representing his country, I’m representing my country. We have to do what we have to do.”

Then he misrepresented the agreement in Singapore, describing it as if it were a real estate deal. “But he did sign a contract,” Trump said of the vague declaration of principles reached in Singapore in June 2018. In fact, it was not a contract, it had no binding force, and it referred to the “denuclearization of the Korean Peninsula.” That phrase means something very different in Pyongyang than it does in Washington: It means the North expects the United

States to pull back its own nuclear-backed forces, including submarines and ships that can deliver such weapons to the peninsula.

So now Trump finds himself in roughly the same place his predecessors did: awaiting a new missile test. It may be a solid-fuel, intercontinental missile, according to some experts like Vipin Narang of the Massachusetts Institute of Technology, to show that the North has finally mastered a weapon that can be rolled out and launched with little warning. And it may carry some kind of payload to demonstrate that the country now knows how to make a warhead that can withstand reentry into the atmosphere, a difficult technology.

But buried in Kim’s New Year’s statement was a suggestion of what he really had in mind: talks with the United States about the “scope and depth” of the North’s nuclear force. That means he really is not interested in denuclearization at all. He is interested in arms-control talks, like the United States conducted for decades with the Soviet Union, and then Russia. And arms control, of course, would achieve what Kim, his father and his grandfather all sought: that insurance policy for the family.