



Who is Going to do the **Work?**

While developed nations battled for decades for high end labor, a demographic crisis has pushed us into shortages of all jobs.

What can the country, and industries do to head off this crisis, if still possible?

Agenda

1. Background

2. Current Labor Crisis

3. Labor Pools

4. Who is going to do the work?

5. Factors affecting young people choosing careers

6. Employer/Society Solutions



Background

In the Demographic Drought: Bridging the Gap, we showed that while there are not enough workers for **all** levels of jobs, the larger issue was the looming lack of people to do the very jobs that keep our country running.

To this end, in the Summer of 2022, Tallo and Lightcast surveyed **1,500 high school and college-age students** and found that while they are more aware of and do not overwhelmingly harbor negative feelings for the trades or community colleges, they still generally **plan to go the 4-year route** and pursue careers more commonly associated with a bachelor's degree.



Key Takeaways

Roughly **85%** of our respondents* indicated that they intended to pursue a 4-year degree at some point with another study from 2021 showing about **55-60%** intended to pursue a 4-year degree

Most recent data shows around **63%** of high school graduates immediately enroll in post secondary programs.



Key Takeaways

2 out of every 3 native born young people are eventually planning to get a 4 year degree so...

Who is going to do the work that keeps the country fed, protected, and cared for?





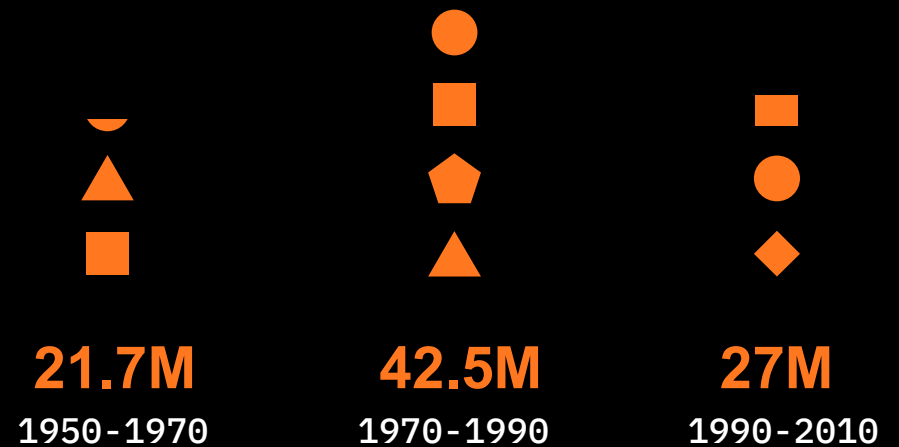
The Demographic Effect

How we got to our destination will
forever affect our future



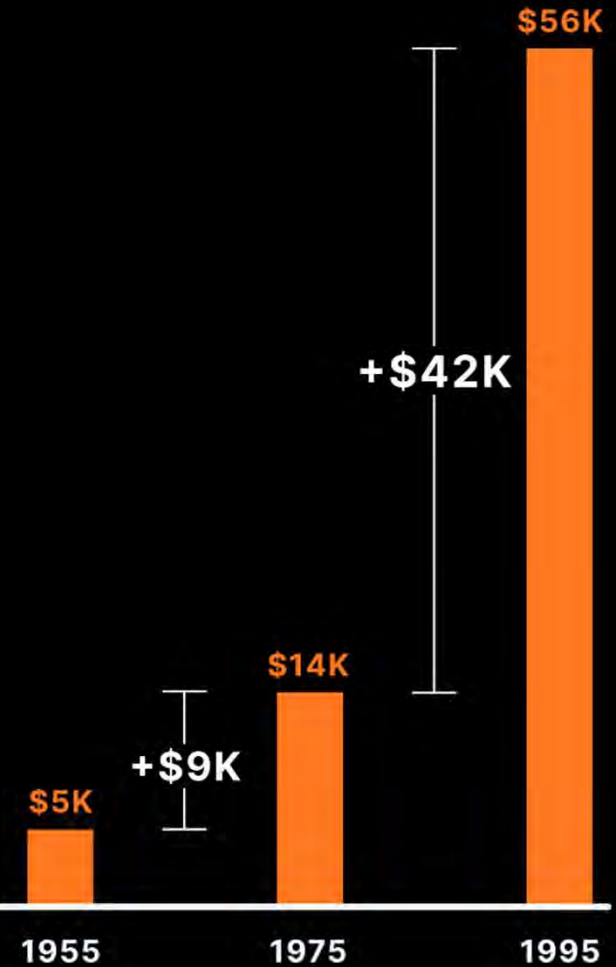
Higher birth rates and women entering doubled our workforce growth

College Enrollment jumped 100% from 1965 to 1975 and continued to soar for women



Boomers generated massive household wealth gains

REAL Median Household Income

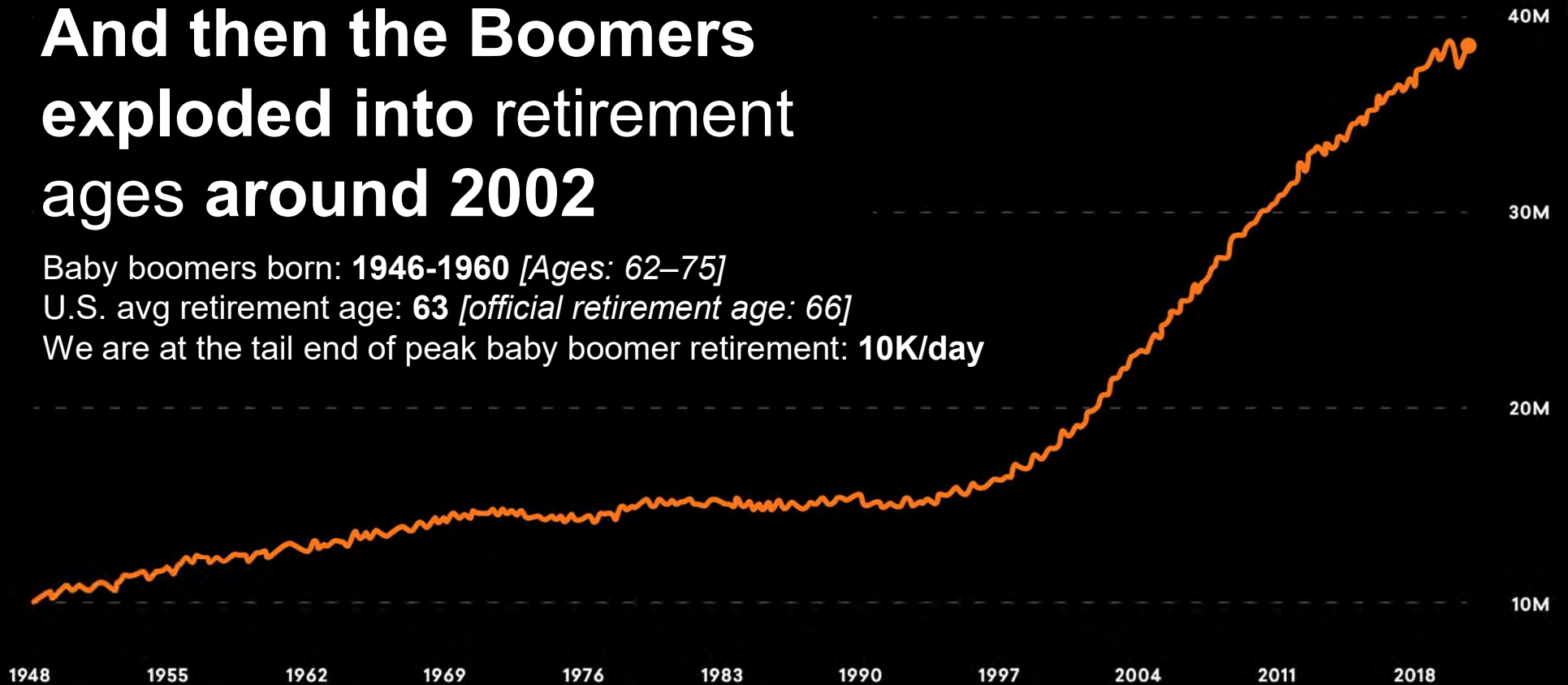


And then the Boomers exploded into retirement ages around 2002

Baby boomers born: **1946-1960** [Ages: 62–75]

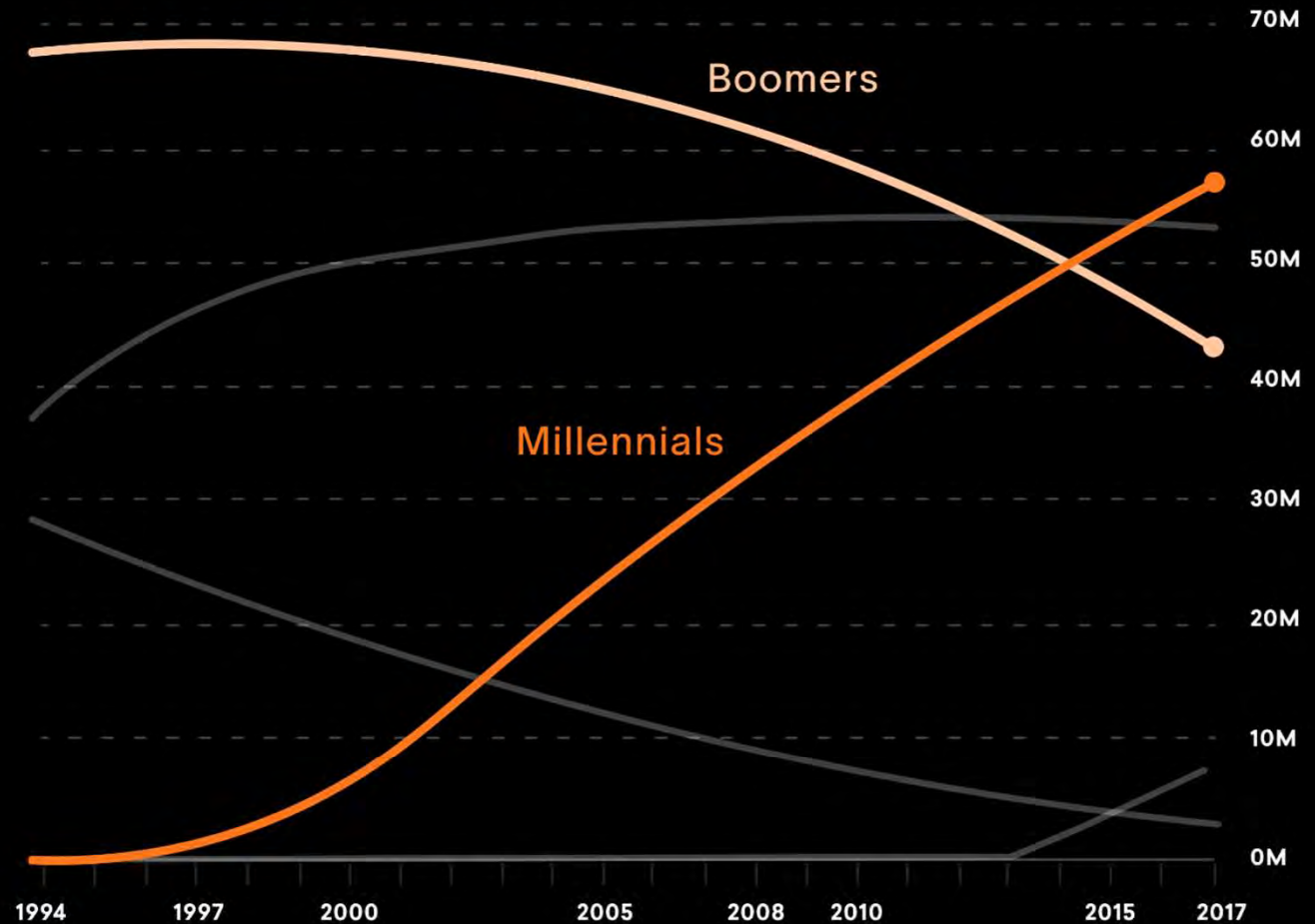
U.S. avg retirement age: **63** [official retirement age: 66]

We are at the tail end of peak baby boomer retirement: **10K/day**



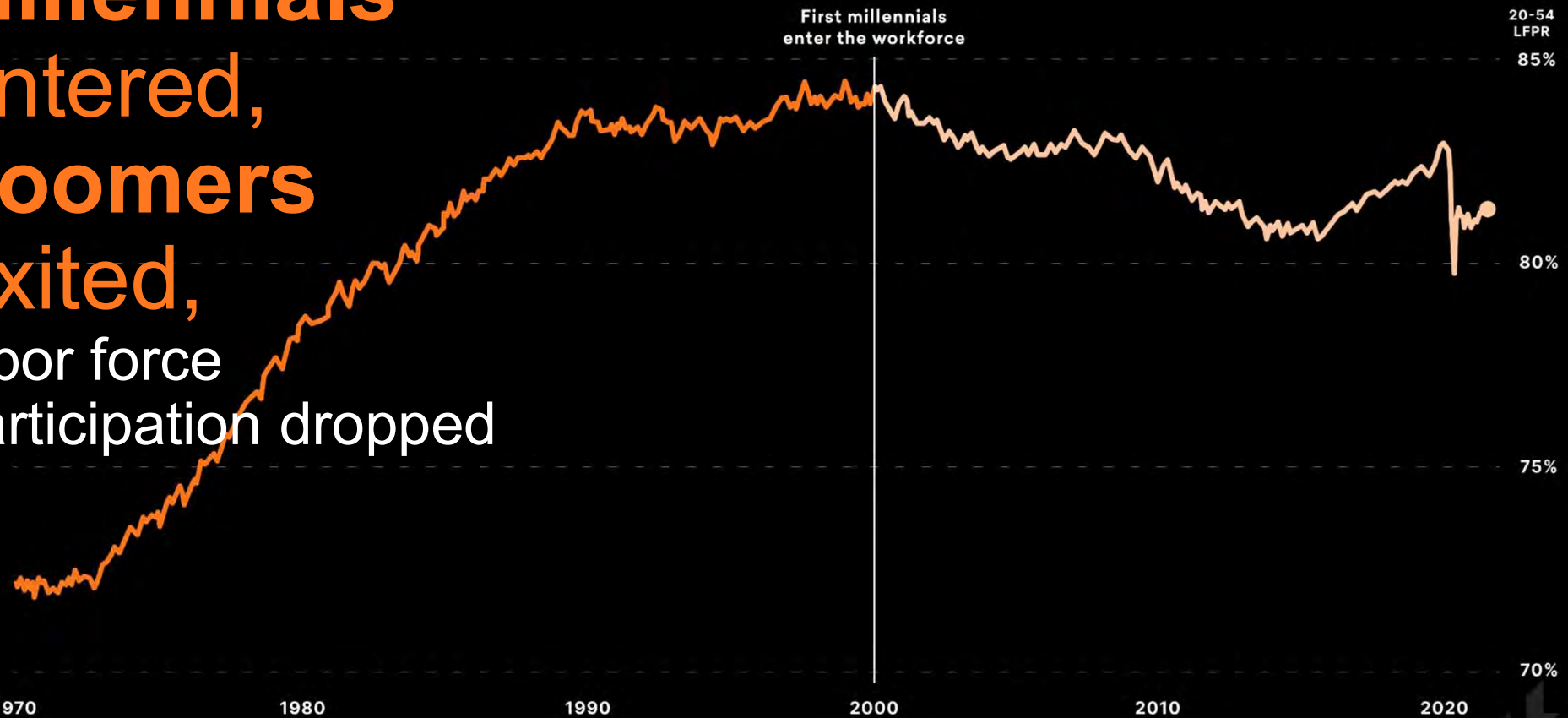
In 2016,
**Millennials
became the
largest
generation in
the labor
force**

*Note: Labor force includes those ages
16 and older who are working or looking
for work. Annual averages shown.*



Source: Pew Research Center analysis of monthly 1994-2017 Current Population Survey.

Millennials
entered,
boomers
exited,
labor force
participation dropped



The number of working prime age men continued to plunge

Prime age male LFPR down over 5% from 1990 – Jan 2020



Prime age female LFPR up nearly 3% from 1990 – Jan 2020

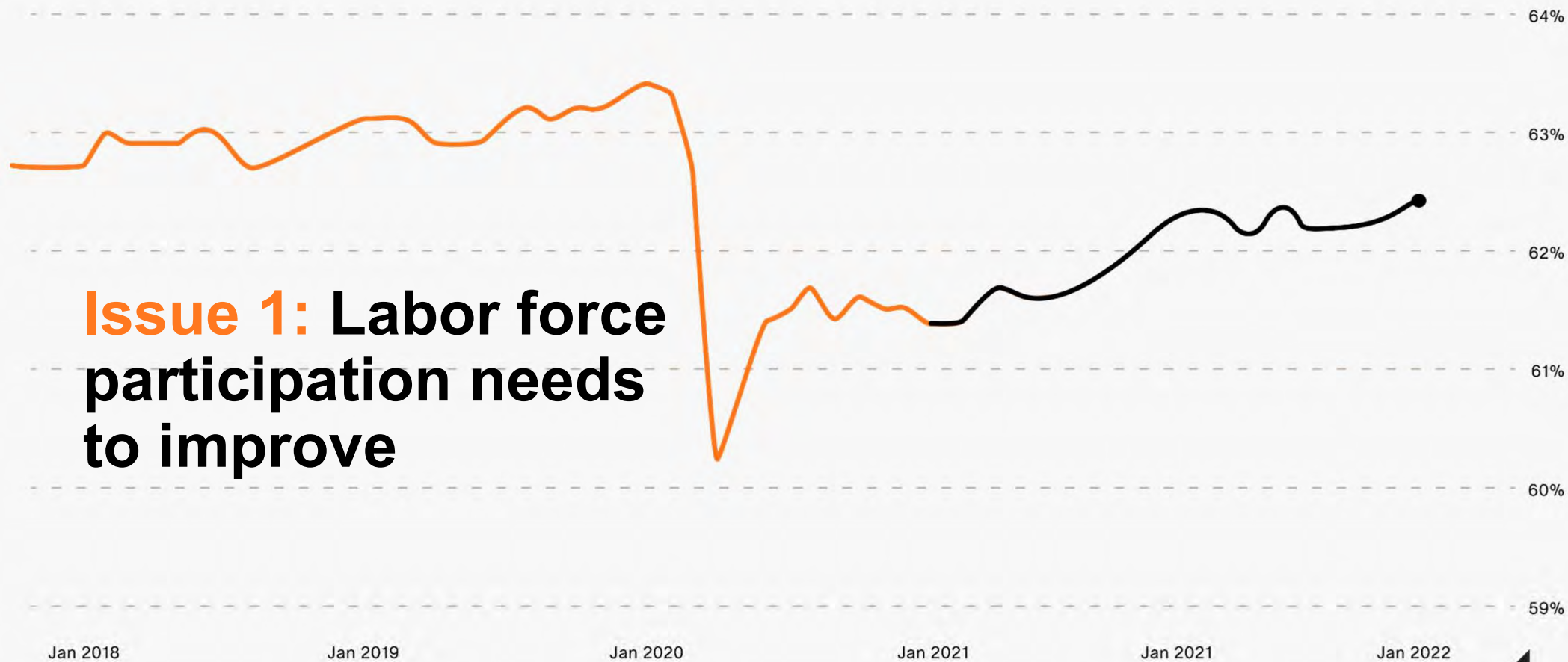


Current labor crisis



Current Labor Crisis

Issue 1: Labor force participation needs to improve



Source: BLS, CPS



The 55+ cohort left the labor force at a much higher rate than the others, and millions may stay out

About three million workforce dropouts say they don't plan to return to pre-Covid activities
 - [wfhresearch.com](https://www.wfhresearch.com), [WSJ](https://www.wsj.com), Apr 16, 2022

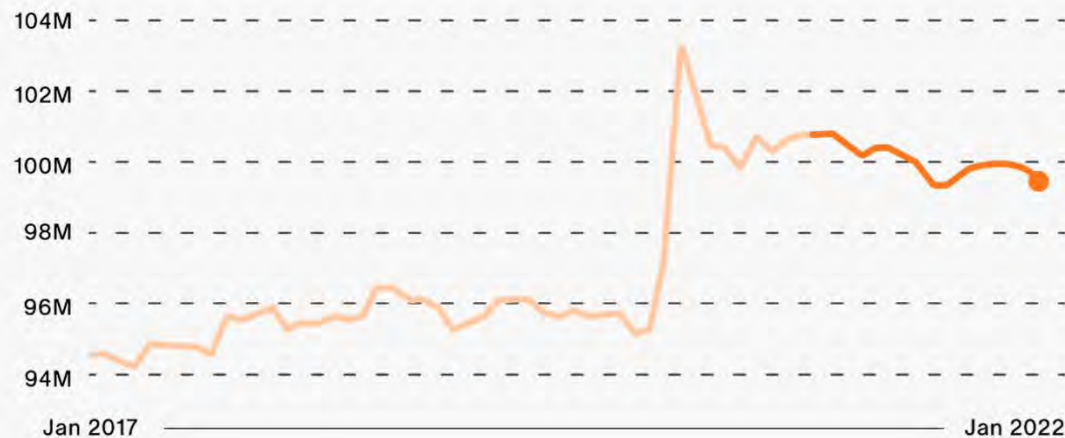
Age	Labor Force Change	Excess Not in the Labor Force
16-24	972	681
25-54	1,686	-111
55+	-473	3,525
Total	360	4,095

Compared to Feb 2020*

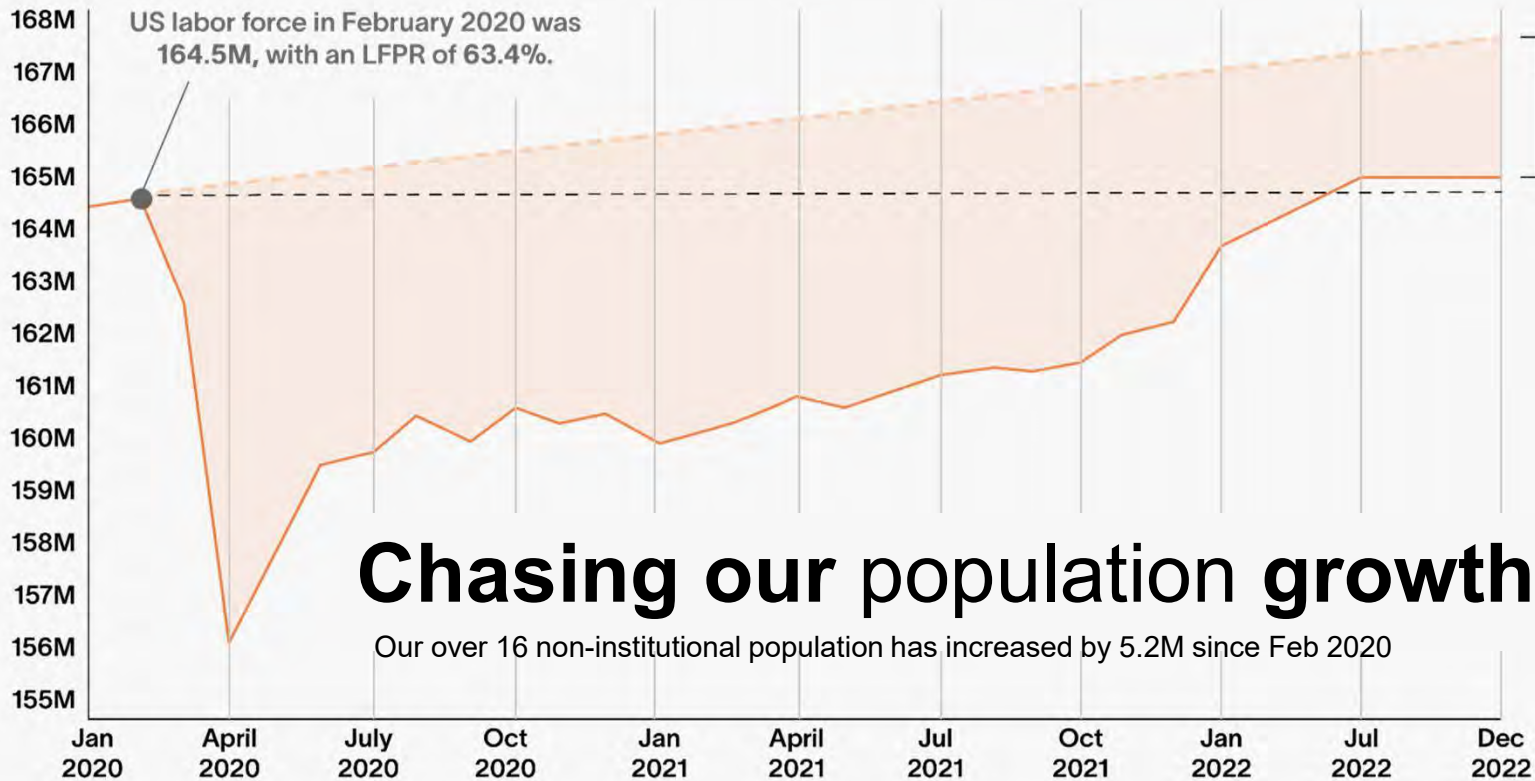
All data in k's Source: Lightcast analysis of US Census Current Population Survey and Bureau of Labor Statistics data

*16-24 not in labor force compared to same month 2019 due to extreme seasonality

Not in the Labor Force



Current Labor Crisis



Chasing our population growth

Our over 16 non-institutional population has increased by 5.2M since Feb 2020

We need **2.4M more people** in the labor force to recover

In **Aug '22** the labor force finally made it back to its level in Feb 2020

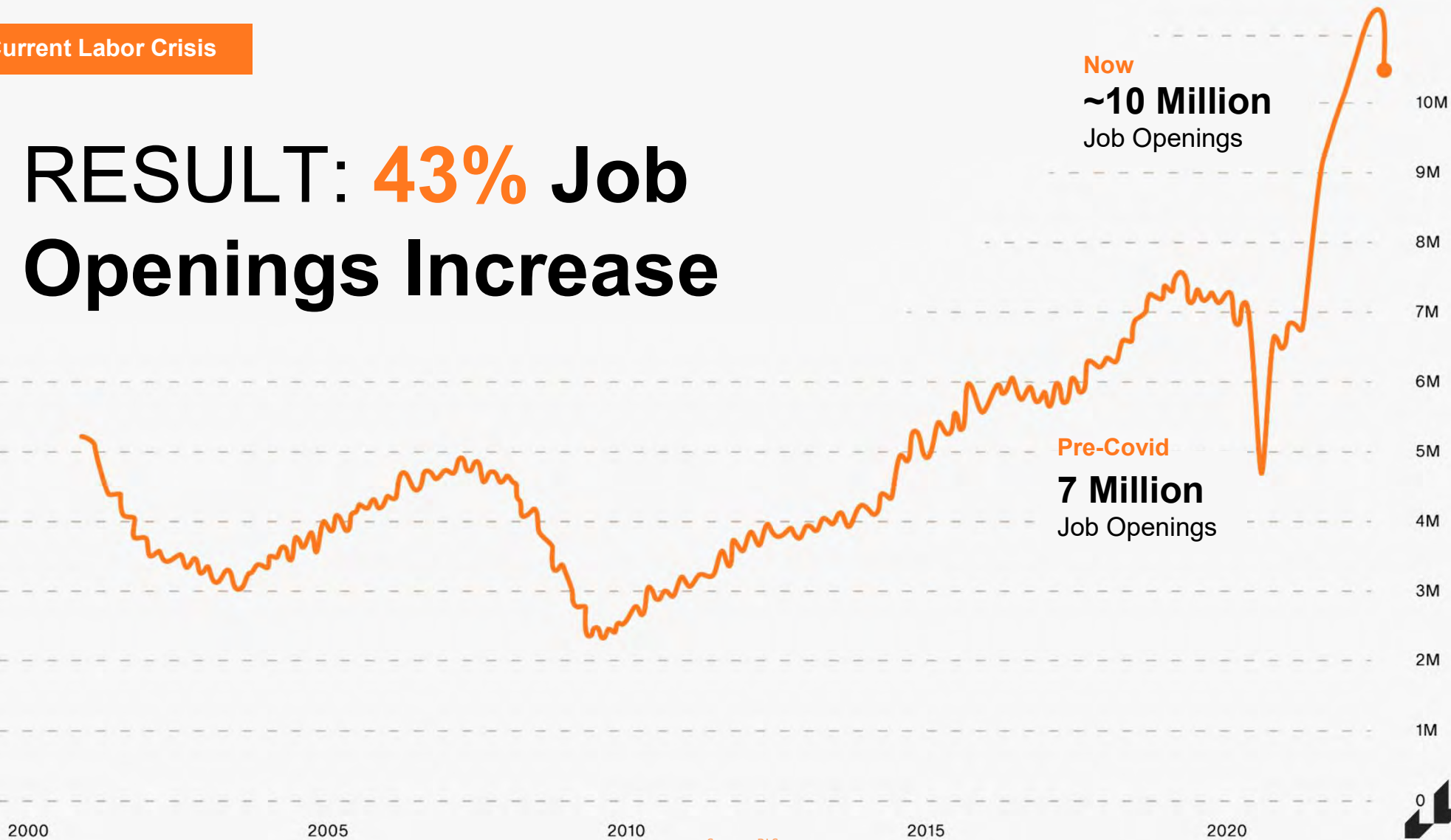
The US has seen minimal labor force growth since late 2019.

Source: BLS, Current Population Survey, Seasonally Adjusted; February 2022



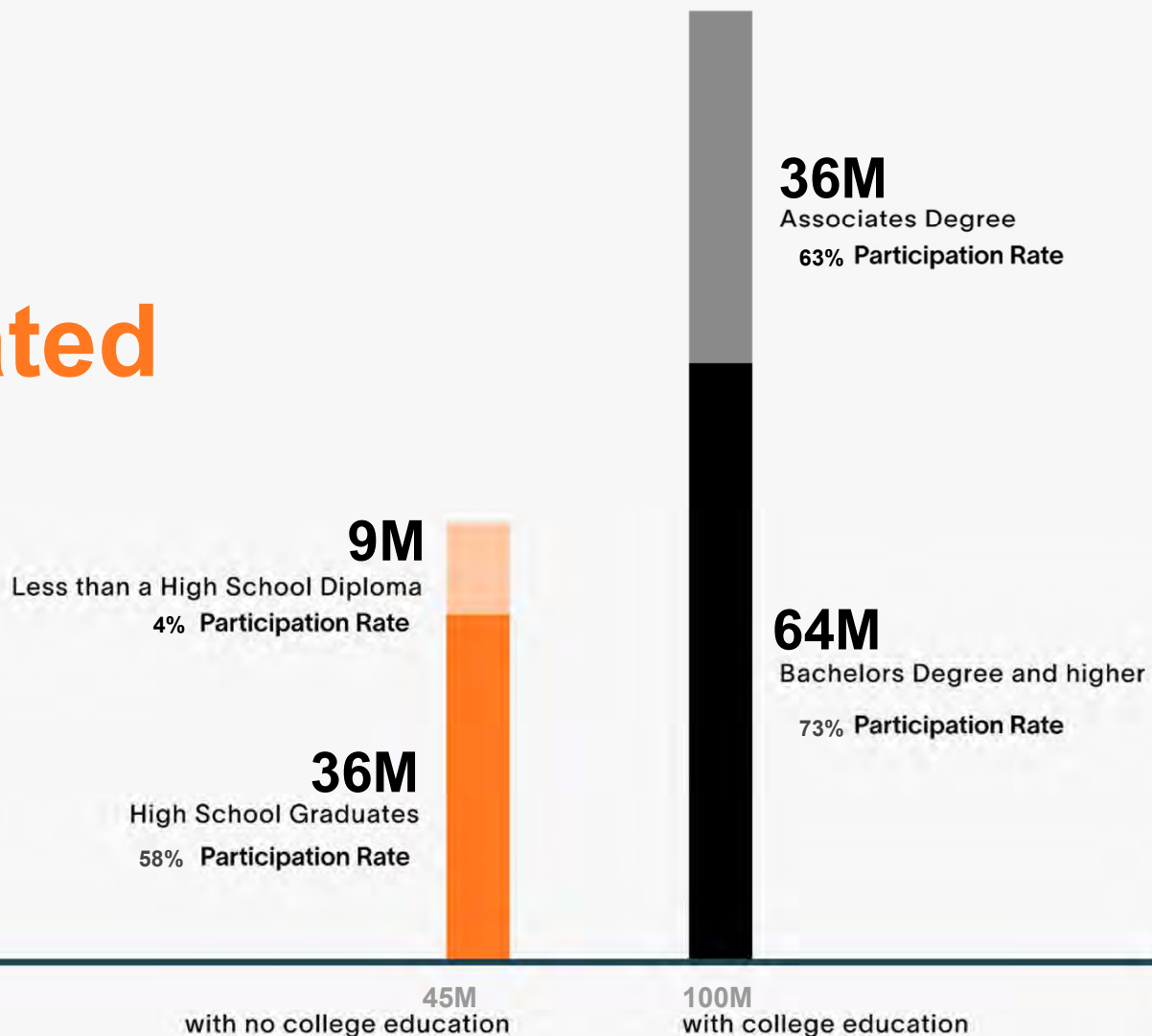
Current Labor Crisis

RESULT: **43%** Job Openings Increase



The U.S. is highly educated

And more educated people have a higher labor force participation rate



Source: BLS, CPS Table A-4



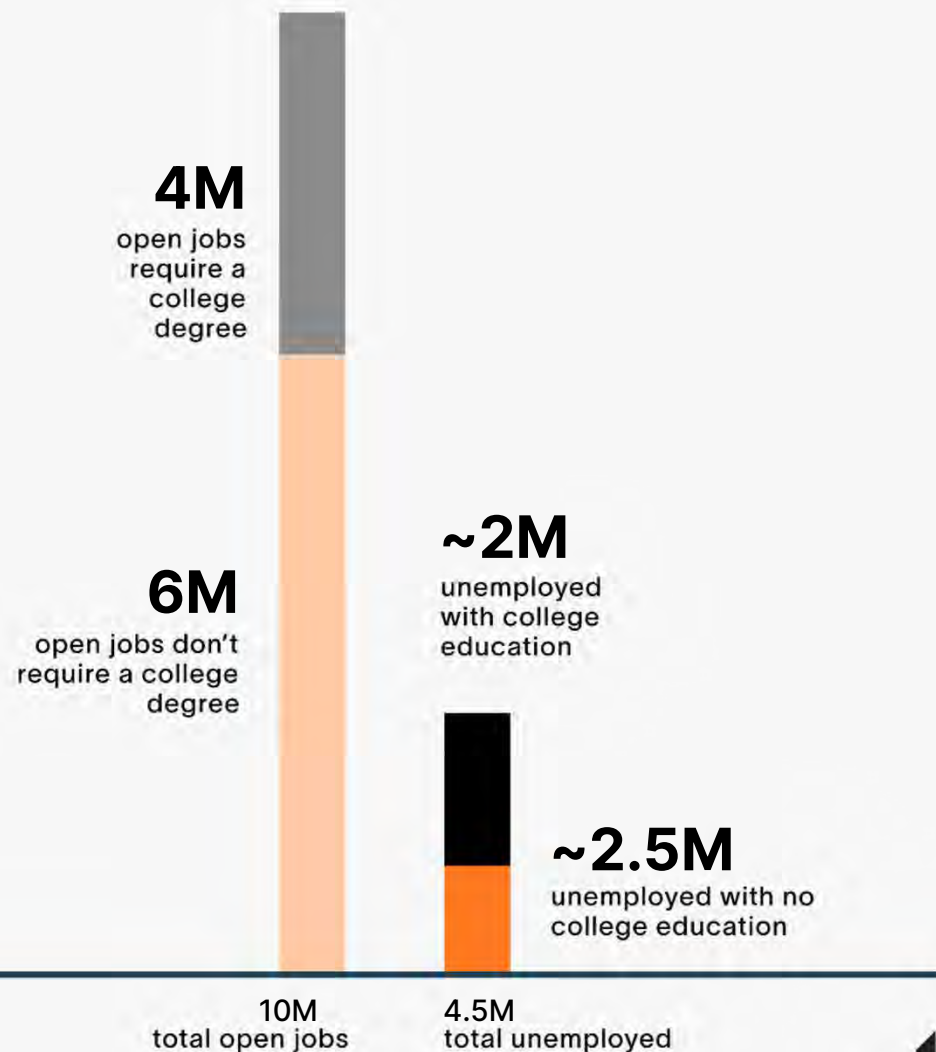
Roughly 6M of the 10M open jobs in America

need to be filled by people **without a college degree**

37% of people out of the labor force are those with a high school diploma.

Only 12% have a bachelors.

Unemployment rates for most college degreed jobs are low but not close to record low levels.



3x

In 2015, we had three times as many unemployed lower skilled job workers per job opening than we have now.



Wage inflation soared

	Production Occs % OTY Change	Transport/Warehouse Occs % OTY Change
2012 – 2019 (avg)	1.9%	3.4%
2021	6.0%	6.6%
2022	6.7%	8.5%

Call center reps have seen their pay increase 27% nationally since just prior to the pandemic from \$15/hr. to just under \$20/hr. With a 40% mark-up, that pay difference would mean \$3,696 more revenue on a 3-month assignment.



U.S. Labor Pools

“The United States could also be facing a deficit of more than 6 million workers”

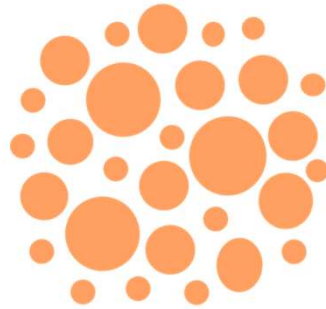
(by 2030) - Korn Ferry



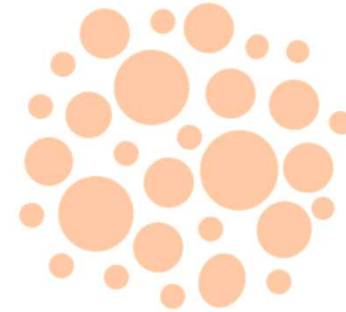
The U.S. has effectively 3 labor pools



Native
Born



Legal
Immigrants



Undocumented
Workers



**Native
born**
workers

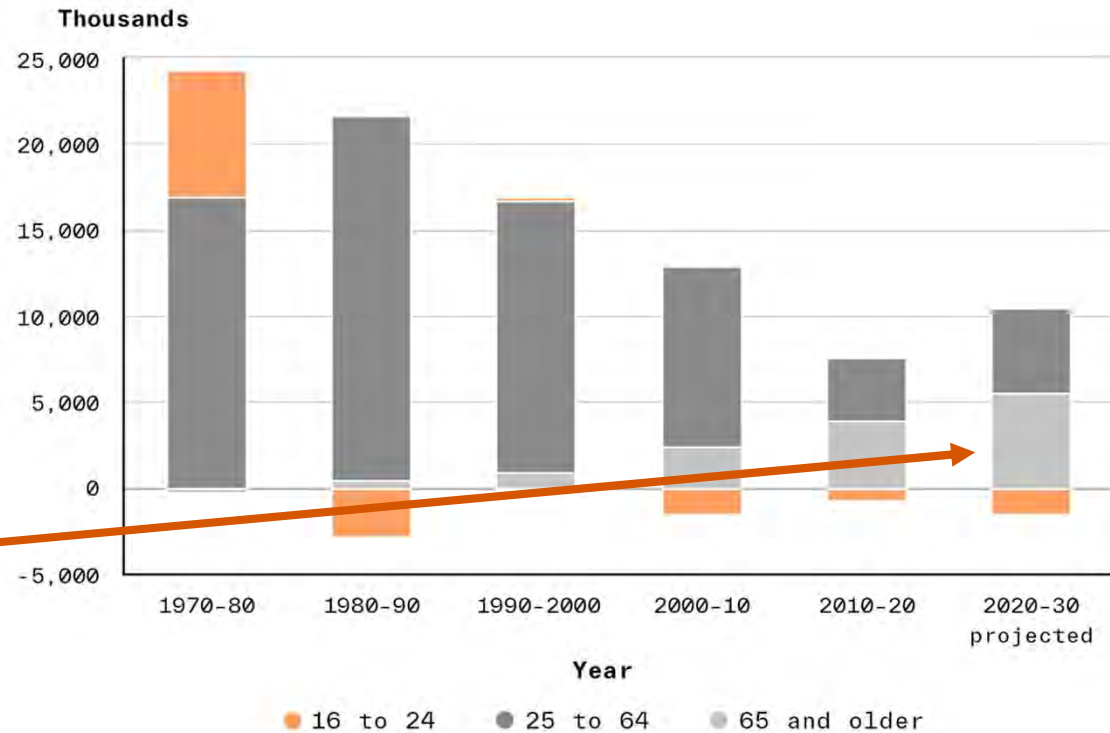


The Future Labor Crisis

Most of our labor force growth to 2030 will be over 65 but the vast majority of those people will retire

According to Gallup as of '22, the average person says they will retire at 66, but, they actually retire at 61.

Labor force growth, by age group, for selected periods and 2020–30 projected



U.S. Bureau of Labor Statistics

SOURCES: BLS, <https://news.gallup.com/poll/394943/retiring-planning-retire-later.aspx>

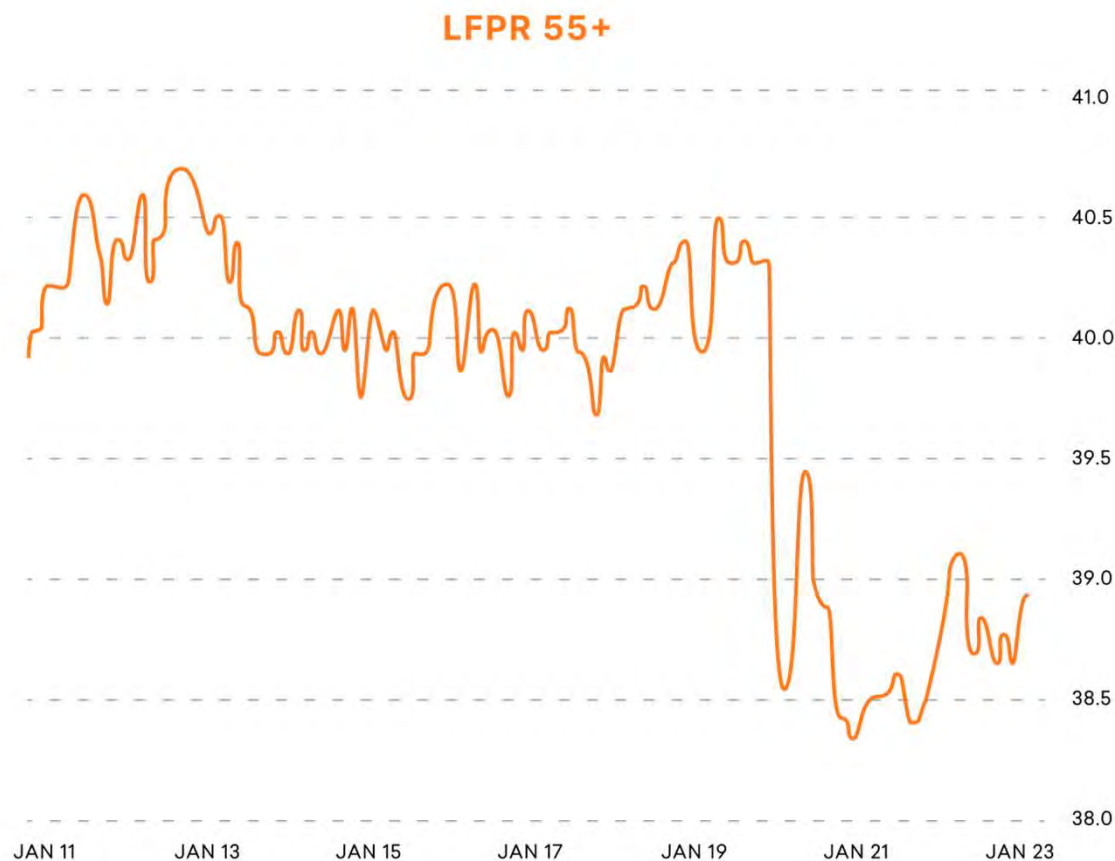


Labor force participation (55+) not recovering

Study by the St. Louis Fed:

Large majority of excess retirements from the **65–74**-year-old group.

Census data also shows small percentage of **55-61** yr olds retired early and the ones that did tended to be in poor health.



16-19 year olds are a key “first job” demographic

16–19-year-old population

Boomer children helped explode this group, but that will continue to erode going forward.



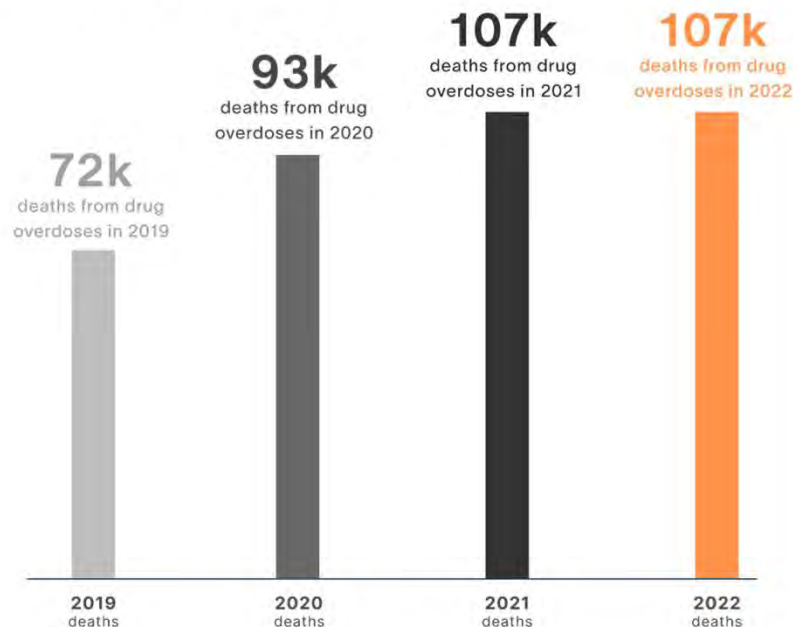
16–19-year-old labor force

Despite a somewhat stable population, the number in the labor force fell for decades and has plateaued lower for a decade.



Prime age excess deaths from overdoses and alcohol surged in 2020, '21, constant in '22

Drug Overdose Deaths



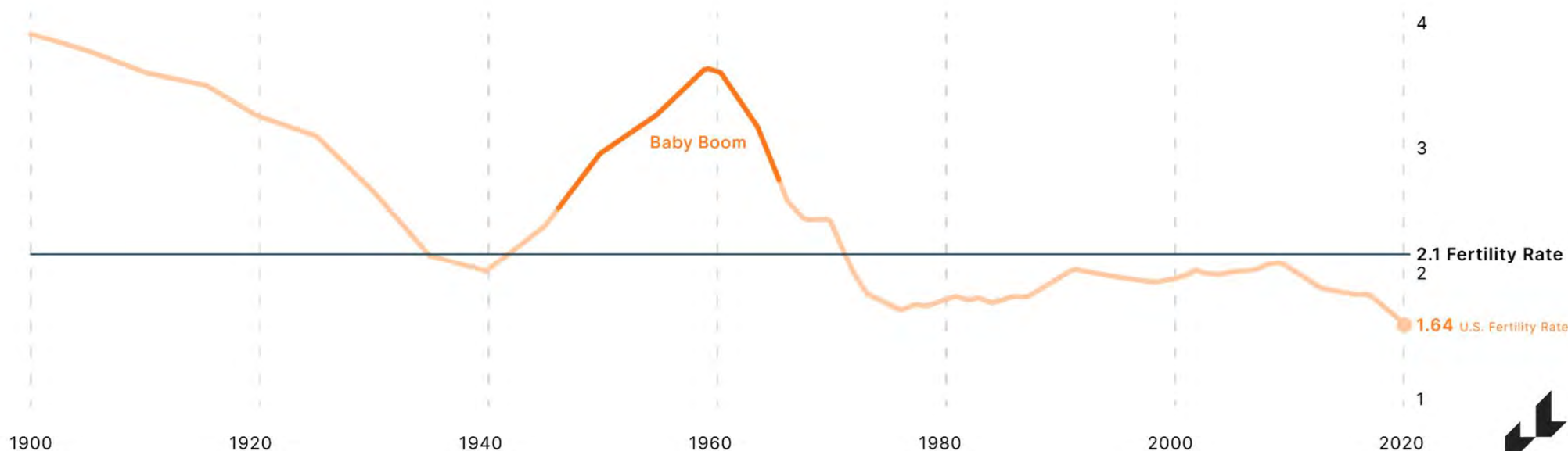
“Estimates of the number of **additional substance abusers** during the pandemic presented here suggest that increased substance abuse accounts for between **9 and 26 percent** of the decline in prime-age labor-force participation between February 2020 and June 2021.”

- <https://www.nber.org/papers/w29932#fromrss>



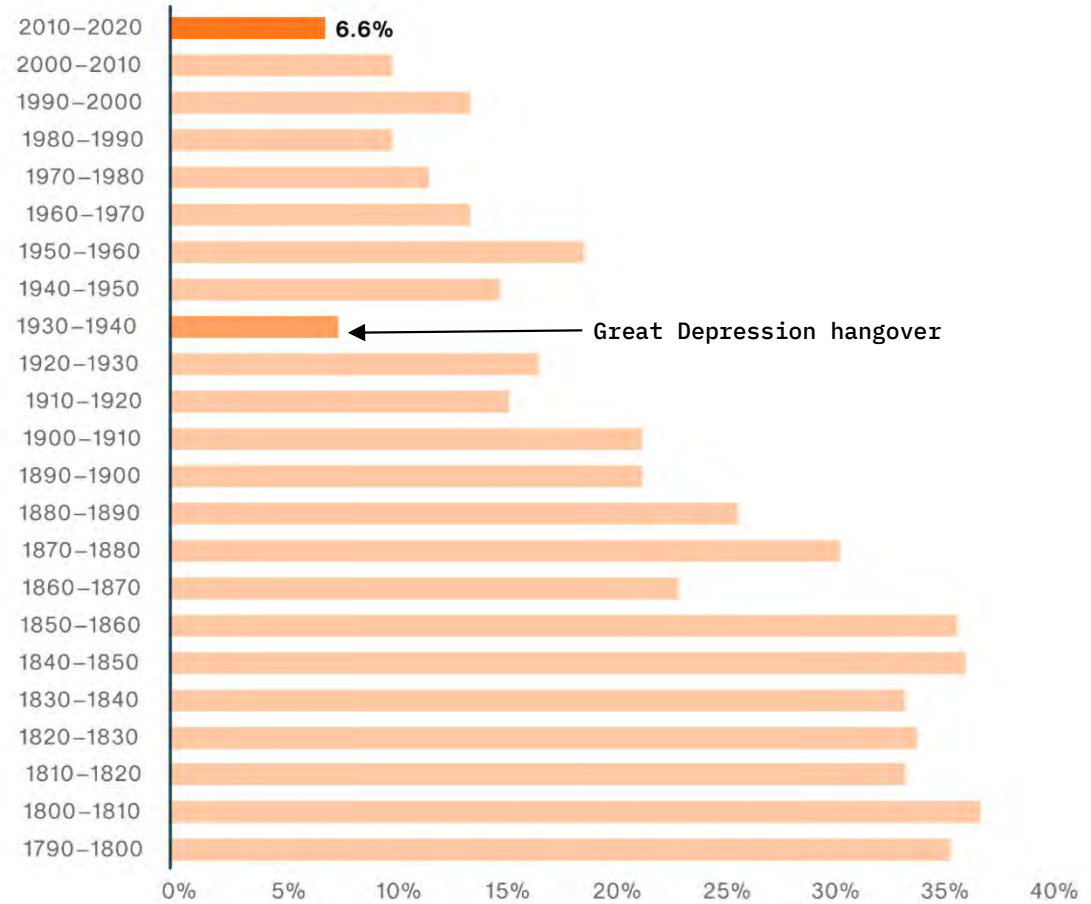
We're living below the 2.1 birth replacement rate

We can't employ what we don't have



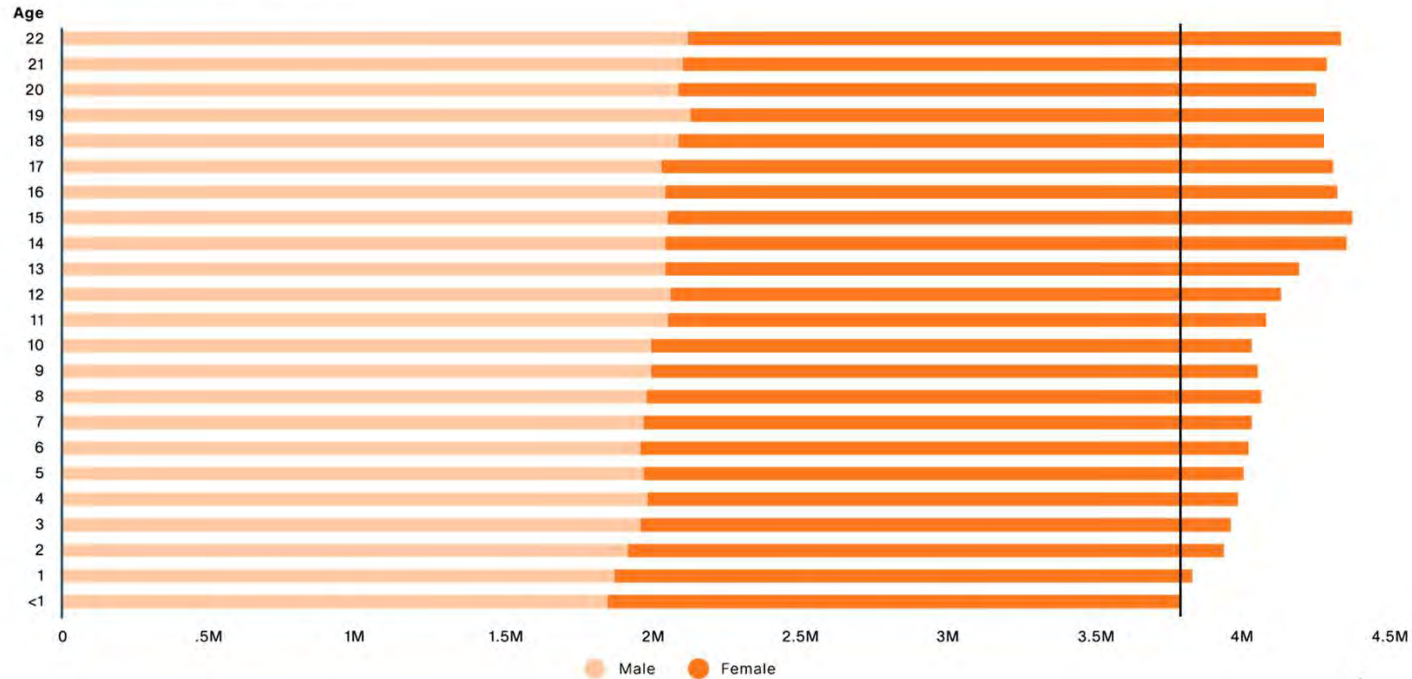
US population growth by decade

1790 to 2020 (estimated) censuses



Over the next 16 years, we will have nearly 1M fewer potential entrants

From 2010 to 2021, the 0 to 4 age group **declined 6.7%**, the largest drop of all age groups.
- USA Facts



SOURCE: <https://www.census.gov/data/tables/time-series/demo/popest/2020s-national-detail.html> - Monthly Postcesal Resident Population



“By **2034**, older adults will outnumber children for the first time in U.S. history.”

Demographic Drought: Bridging the gap in our Labor Force



Legal Immigrants



Immigration is bouncing back but there is still a significant deficit

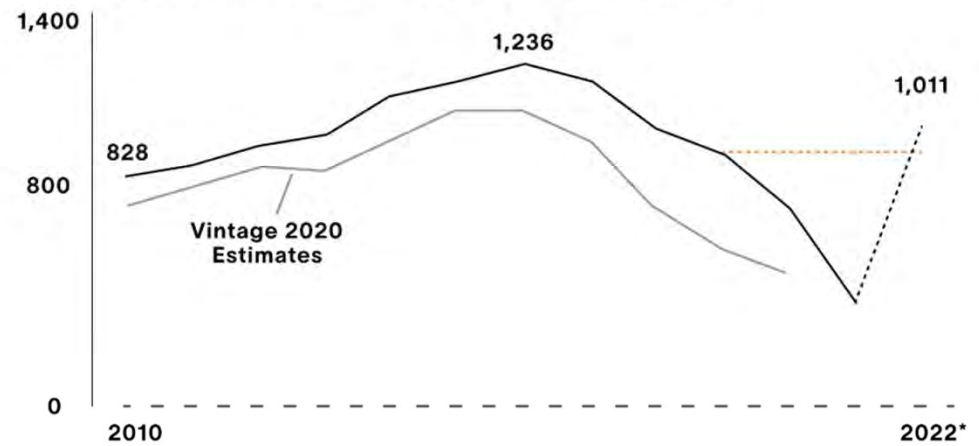
Average immigration numbers per year:

1990-99	977,500
2000-09	1,029,900
2010-19	1,063,300
2020-21	576,000

We have a gap of a million legal immigrants

Immigrants in the Civilian Labor Force 2010-2022

Net International Migration: 2010-2022 (in thousands)



* Data shown for 2022 are projections.

Note: Year represents the annual estimates period ending on June 30. Released estimates will report 2010 and 2020 as a quarter year (April 1-June 30) instead of a full year.

Source: U.S. Census Bureau Vintage 2020 Estimates (2010-2020); Internal Simulation of 2010-2020 Estimates; and Vintage 2022 Estimates (2021-2022).

New international student enrollments fell **45.6%** in 2020-21.

Total foreign enrollments fell **15%** to 914K.



Immigration is an opportunity to recover our labor crisis for lower skilled jobs

Job openings have soared in lower-skilled industries.

Occupational Group	Foreign Born	Native Born
Service Occupations	20.6%	14.4%
Nat. Rsc, Construction, Maint.	13.6%	8.1%
Production	15.2%	11.7%

Source: BLS JOLTS, internal analysis, CMS

% of their total workforce



DID YOU KNOW...?



1 out of every 4
construction, farming and
maintenance workers is
foreign born



1 out of every 5
manufacturing workers is
foreign born



Healthcare relies heavily on immigration

1 out of every 4 physicians & surgeons

1 out of every 5 nurses

1 out of every 4 health aides

Select Healthcare Occupations in the US

Occupation	Immigrant Share of Workforce
Physicians & Surgeons	28.2%
Health Aides	25.3%
Lab Technicians	19.6%
Nurses	15.3%
Respiratory Therapists	13.6%
EMTs	5.1%

Source: NAE Analysis of 1-year sample from the 2018 American Community Survey

Immigrant Share of Healthcare Workers in Select States

State	Physicians and Surgeons	Nurses	Health Aides
New York	36.4%	30.9%	60.7%
New Jersey	40.3%	29.5%	53.7%
California	33.1%	35.2%	44.3%
Michigan	27.1%	7.0%	4.8%
Massachusetts	34.5%	17.1%	39.8%
Florida	36.5%	25.8%	45.6%
Illinois	30.6%	17.5%	20.9%
Washington	24.1%	15.9%	29.0%
Pennsylvania	23.7%	7.9%	11.7%
Texas	31.7%	20.6%	24.5%
Virginia	32.4%	12.7%	17.3%
Georgia	27.8%	11.1%	17.5%
Arizona	28.8%	13.0%	21.4%
Maryland	31.0%	26.6%	40.9%
North Carolina	16.7%	6.8%	4.4%
Ohio	27.1%	3.7%	7.8%

Undocumented Workers



Myths about undocumented workers

- We don't know how many are here
- We don't know where they work
- Everyone who comes to the US stays here (roughly 1M return home every year)
- They're all fentanyl dealers (77% of all drug traffickers are American, 2% of all border drug seizures in 2022 were fentanyl/heroin. Drug seizures were down dramatically in 2022 despite record border encounters)
- They all cross the border (~40% of undocumented immigrants overstayed their work or travel visas)



Current Labor Crisis

12M Illegal Immigrants are in our population, 2/3rds are employed

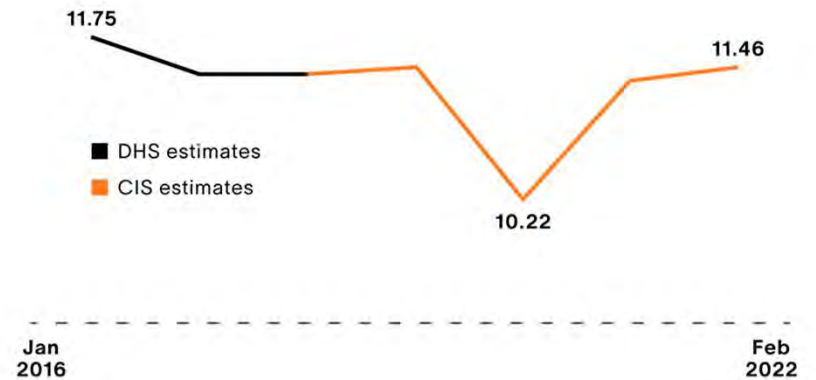
Undocumented immigrants make up approximately 3.2 percent of the U.S. population, but **4.4 percent of the country's workforce.**

There are more than 8.5 million* undocumented immigrants working in the United States.

In 41 states and Washington, D.C., there are more than 10,000 undocumented workers, and in 16 states that total is greater than 100,000.

There was an increase of about 1M last year on net.

DHS and CIS Estimates of the Illegal Immigrant Population, January 2016 to February 2022 (in millions)



Source: Department of Homeland Security and Center for Immigration Studies estimates of the illegal immigrant population.



They work in critical sectors



1.4M work in construction, **13%** of all construction workers.



15% of workers in building and grounds cleaning and maintenance occupations



1M work in accommodation and food services, approximately **8.4%** of the industry



Nearly **one-quarter of a million** are working as health care providers and 188K as custodians, food servers for healthcare



~ **1.7M** work in the nation's food supply chain—from **358,000** farmworkers and food processors to **154,000** working in supermarkets, grocery stores, and convenience stores.

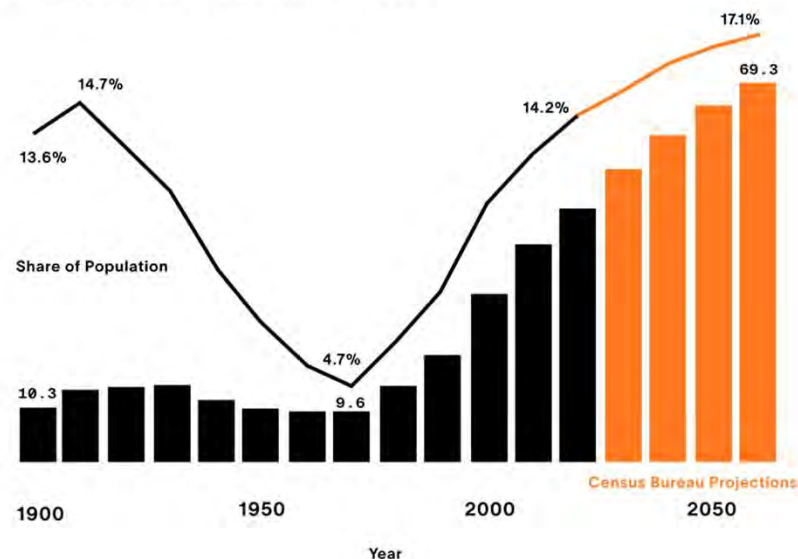


Immigrants are now the most significant driver of employment growth in the US.

“The monthly CPS also shows that the total foreign-born population (legal and illegal together) grew to 46.7 million in February 2022, a new record high in American history and an increase of 1.7 million since January 2021.”

“Illegal immigrants account for more than one million (about two-thirds) of the increase in the total foreign-born population since January of 2021.”

Foreign-Born in the U.S. Number and Percent, 1900-2022, plus Census Bureau Projections to 2060



Source: Decennial Census for 1900 to 2000, American Community Survey for 2010, February Current Population Survey (CPS) for 2022. The CPS does not include the institutionalized. For 2030 to 2060, see

SOURCE: americanprogress.org, migrationpolicy.org, CPS microdata, Pew Research



The Reality

Most of our labor force growth in the past 2 years was likely driven by young immigrants





Who is going to do the work?

The US labor force is currently predicted to grow by 23M to 2038

Unskilled Labor

(high school diploma or less)

College Educated

(Bachelors, Masters and Doctorate)

Skilled trades

(high school, trade school or Associate's degree)

A battle has been forming and will intensify between 3 occupational groups



The math problem

Sector breakdown



The math problem:

Non White Collar Jobs: Food Supply

There are 860K people employed in the beef cattle production industry in the US alone. *Most food supply jobs do not require a college degree*



The Future Labor Crisis



Long distance trucking
Employment: 838K



Agriculture
Employment: 2.6M



Food & Bev Processing
Employment: 1.7M
114K annual openings



Cold storage
Employment:
74K



Food Wholesalers
Employment:
791K



Restaurants
Employment:
10.8M



Grocery stores
Employment: 2.8M

Lightcast job openings:
Waiters - 30K
Food Prep - 8K
Fast food counter - 60K
Cooks - 20K



The math problem:

Non White Collar Jobs: Homes

Many industries that are related to housing are predicted to lose employment to 2031, however, they still have to replace significant numbers of retirees and those leaving these industries



The Future Labor Crisis

BLS projected around 270K openings annually, but, currently, the industries where these sectors belong have around 1M job openings adjusting for share

Utilities

Employment: 543K



Home Construction/ Home Repair

Employment: 3.2M



Home product wholesalers

Employment:
943K



Home building manufacturing

Employment: 5M

Home product retailers

Employment: 10.8M





The math problem:

Non White Collar Jobs: Community Welfare



The Future Labor Crisis

From cops to fire, to nursing homes, the US has many needs

Occupation	Employed	Annual Job Openings	<u>Net</u> new needed yearly
Firefighters	326	28,000	1,300
Police Officers	688	59,000	2,200
Security Guards	1,087	155,000	3,800
Janitors	2,298	335,500	8,500
Animal caretakers	291	70,400	8,600
Barbers/Hair Stylists	609	94,000	6,500
Childcare workers	949	170,000	6,100
Recreation workers	280	62,000	2,800
Garbage Collection	139	20,600	750
Automotive technicians	1,759	178,000	6,400

1.2M

47K



Oh, and this as well...

Every branch of the military is struggling to make its 2022 recruiting goals, officials say

With a record low number of Americans eligible to serve, and few of those willing to do it, this "is the year we question the sustainability of the all-volunteer force," said an expert.



The math problem:

White Collar Jobs: Healthcare

As the US struggles to find critical service workers, the industry most in demand will be healthcare as aging boomers put historic pressure on the industry.





Nursing care facilities

Employment: 3.1M
New jobs/yr: 14K



Home Health Care

Employment: 1.6M
New jobs/yr: 33K

Projected annual job openings:

647K, net new jobs will equal **79K** annually, current openings around **2M!**



Hospitals

Employment: 5.3M
New jobs/yr: 32K



Doctor's Offices

Employment: 2.9.M
New jobs/yr: 27K

Annual hiring need:

Registered Nurses: **203K**
Physicians: **22K**
Health technologists (lab techs): **256K**
Therapists: **56K**
LPNs: **59K**
Pharmacy techs: **44K**



The math problem:

White Collar Jobs: IT and Engineering

Automation, robotics, and the internet will increasingly become the way of dealing with chronic labor shortages.



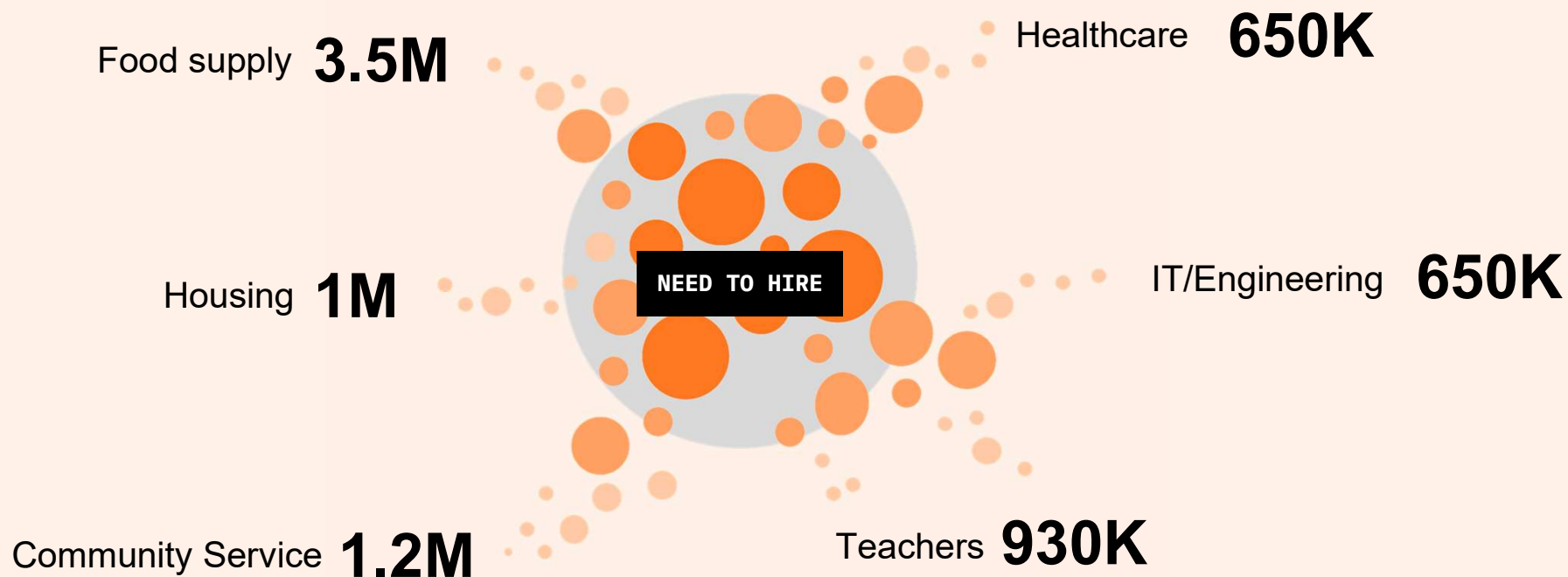
Lightcast data shows around 330K IT job openings and 140K Engineering currently

Occupation	Employed (k's)	Annual Job Openings	Net new needed yearly
Computer Occupations	4,700	418,000	68,200
Arch & Engineering	2,562	201,000	9,000
		650K*	77K*

* includes managers and related



The Future Labor Crisis



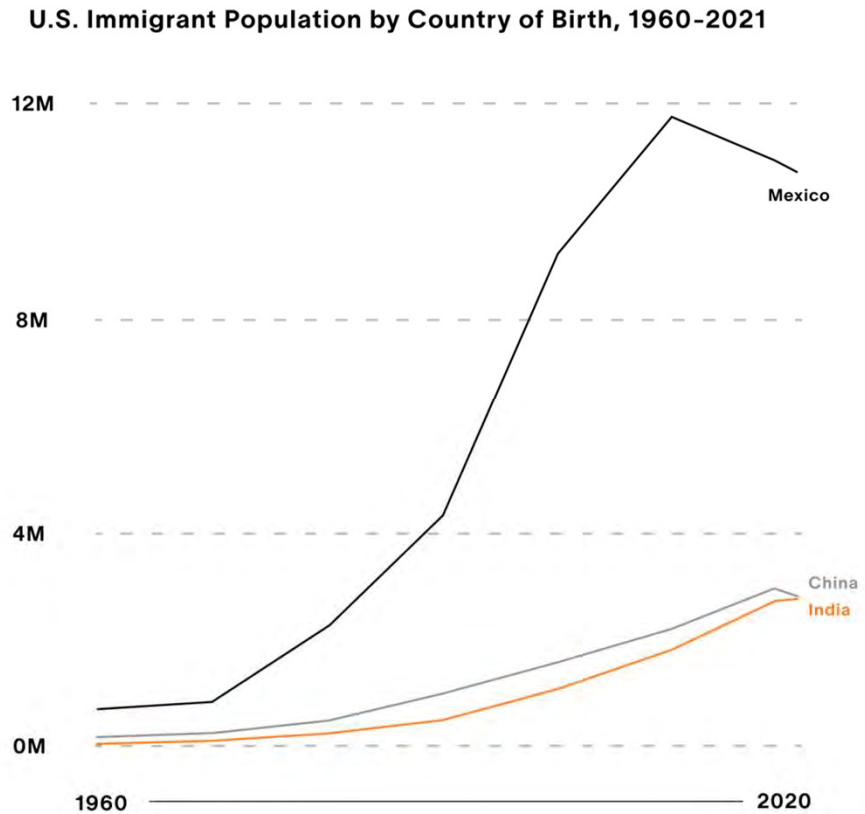
8M jobs to fill every year



The predominant country of origin for US immigrants is Mexico with about 1 in 4 migrants.

China and India are essentially tied for 2nd.

SOURCE: Migration Policy Institute (MPI) Data Hub

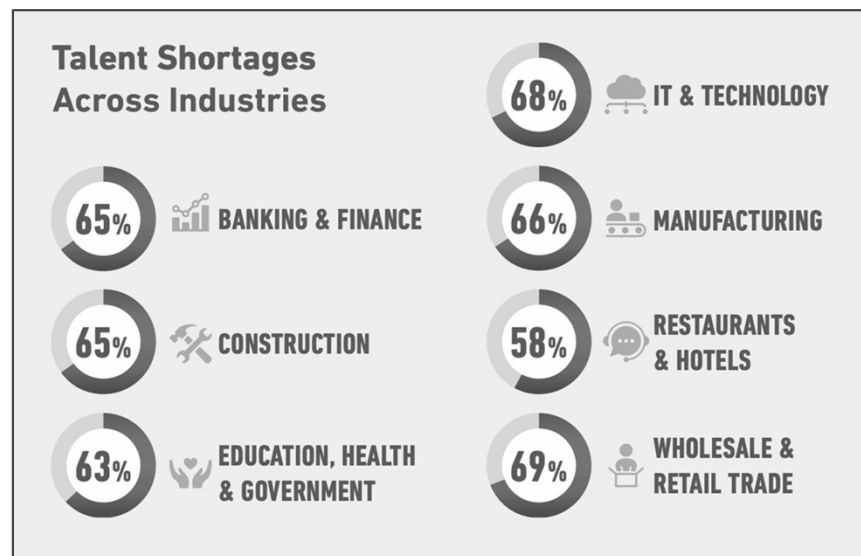


The math problem immigration will **dry up**

Countries who send the most immigrants to the US are having their own problems

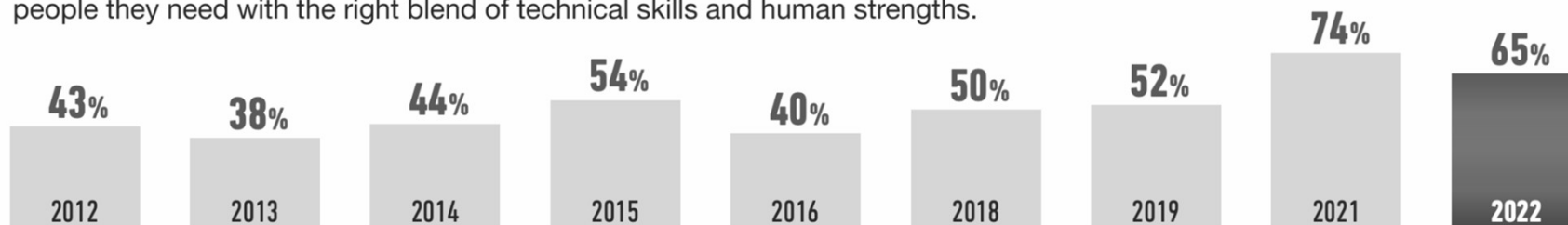
MEXICO

Infographic: "Mexico's 2022 Talent Shortage" - [Manpower](#)



Talent Shortages Over Time

From manufacturing to marketing, transport to trade, employers cannot find the people they need with the right blend of technical skills and human strengths.



THE BOTTOM LINE

There is very little chance that the US will be able to fill the critical jobs that keep an economy functioning outside of immigration.

This could improve if certain fundamental aspects of society change.

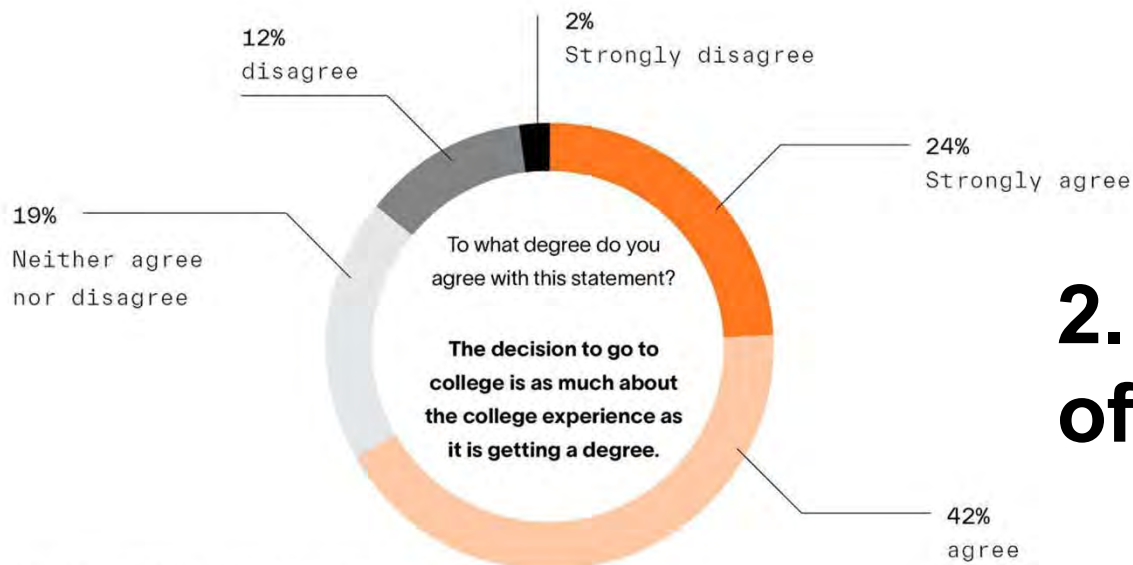


A black and white photograph of two young adults sitting on stone steps. The person on the left is a Black woman with her hair pulled back, wearing a plaid shirt and dark pants. The person on the right is a white woman with long dark hair, wearing a light-colored hoodie and light-colored pants. They are both looking at each other and appear to be in conversation. A backpack is on the step to the left. The background is a textured wall. The text 'Significant factors affecting young adults' labor force decisions' is overlaid in white on the image.

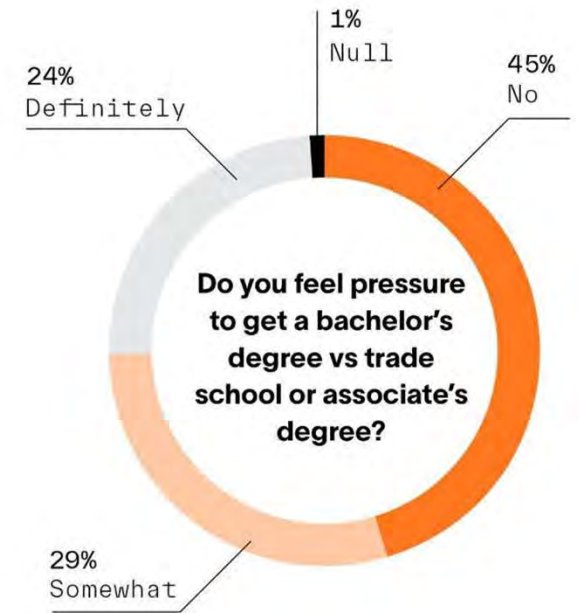
Significant factors affecting young adults' labor force decisions



1. Societal, peer, and family pressure to get a college degree



TALLO/LIGHTCAST STUDENT SURVEY, 2022



TALLO/LIGHTCAST STUDENT SURVEY, 2022

2. The experience of college



3. Potential, perception and earnings

Thinking about the jobs one can obtain when going to a community college or skilled trade school, what are your concerns?

29% Outcomes,
harder to find a good job

23% Earnings,
don't make enough money

20% Prestige,
Society doesn't value these jobs

Thinking about careers in construction, manufacturing, maintenance, logistics, or agriculture, what are your primary concerns?

(22% had no concerns)

43% Physical Labor

32% Work environment
(I want to work in an office)


27% Unfamiliarity,
not sure what these jobs do

19% Jobs don't pay enough

13% Reputation

Employer Solutions



A close-up photograph of a person's hands working on a wooden surface. The person is wearing a dark, textured sweater. The lighting is warm and orange, creating a soft glow over the scene. The text is overlaid in the center of the image.

Jobs that do not
require a college
degree/ skilled trades



What do Gen Zs want in a job?

Better work/life balance. “More than half (56%) of Gen Z said they would leave their job if it interfered with their personal lives”

“I want to **make a difference** before I want to make money,”

“42% of Gen Zers would rather be at a company that gives them a **sense of purpose** than one that pays more.” – Lever report

“62% of Gen Z plans to start or possibly **start their own business** in the future.”

“I want to **know what is expected** of me at work”

“The **mission or purpose** of my company makes me feel my job is important”



1 Skilled Trades, as well as any other non-college occupation **suffers from a marketing problem**



Compensation & Experience

Much quicker path to gaining experience, a four year head start

Career Progression

From apprentice to senior level experience in just a few years.

Value to society

Few are more equipped to give back to their community, help disadvantaged populations, travel the world and contribute to charitable agencies like those in skilled trades

Ownership

Owners gain real world business savvy such as pricing, scheduling, inventory management, negotiation, human resourcing and many more. Furthermore, they gain freedom! Work the hours you want, take vacation when you want. The amount you make is largely under your control.



Employer Solutions

The signs are everywhere...

Maybe labor is about to get more of its fair share: CEO of Waste Management Jim Fish, "We can't hire a truck driver to drive a trash truck for \$90,000 in Houston, Texas, but I can hire an MBA from a small school for \$60,000, and I can get them all day long."

6:26 AM · Apr 4, 2023 · 279K Views

I put an add out for a web designer @ \$20 an hour and had 43 applicants in a week, majority highly experienced.

I've had an add out for a master carpenter @ \$45 an hour for a year and have only a handful of applicants, none with required!

3rd
ghes Enviro
D
e mailing
echnicians

3	Social security wages	134275.37
5	Medicare wages and tips	134275.37

college debt! For anyone considering a career in the Trades, I am telling you the numbers are REAL! #jointhetrades

Employee Reference Copy 2022		
W-2 Wage and Tax Statement		
1	Wages, tips, other comp.	117560.24
2	Federal income tax withheld	
3	Social security wages	117560.24
4	Social security tax withheld	
5	Medicare wages and tips	117560.24
6	Medicare tax withheld	
7	Social security tips	
8	Allocated tips	

Employee Reference Copy 2022		
W-2 Wage and Tax Statement		
1	Wages, tips, other comp.	134275.37
2	Federal income tax withheld	25593.64
3	Social security wages	134275.37
4	Social security tax withheld	8325.07
5	Medicare wages and tips	134275.37
6	Medicare tax withheld	1946.99
7	Social security tips	
8	Allocated tips	

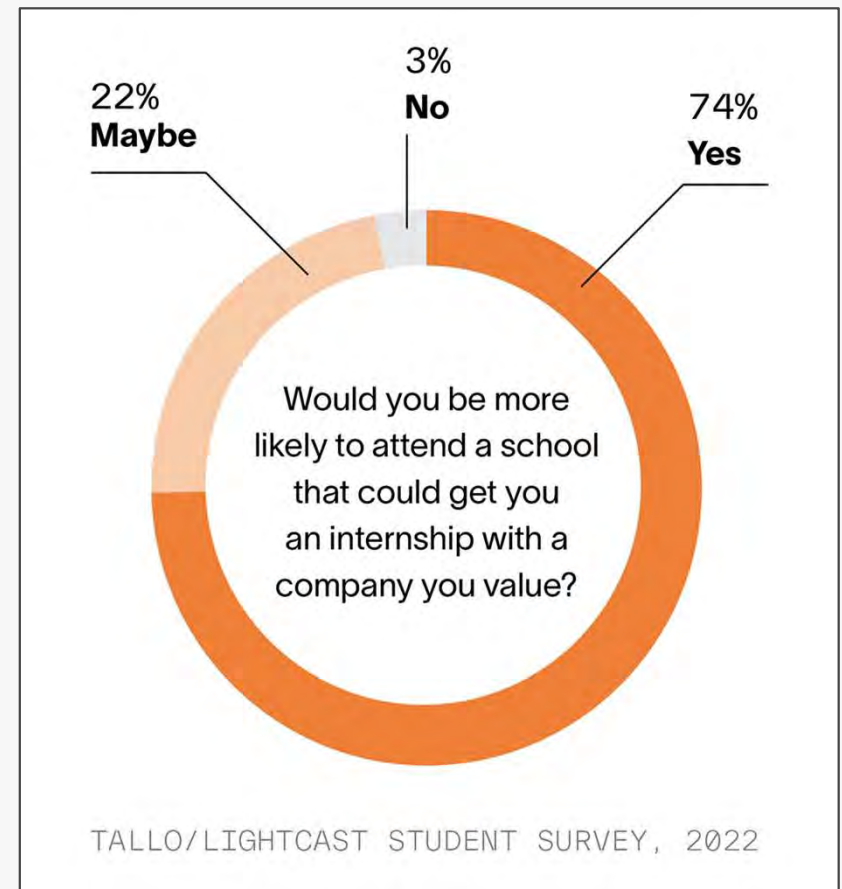
2 Create Social Networks for your Contractors

If they value the “**coming of age**” **experience** of college, work with other businesses to socialize young people with their peers



3 Internships and apprenticeships

Figure out who they value and why they value them.



4 Earlier Messaging.

Get your **message** to them at **younger ages** and then stick with them through graduation.





Jobs that require a college degree

The world is changing, change with it.



Create your workforce

Skills based hiring, and re-examining your ATS screens

The average corporate job opening receives 250 applications while the average job opening gets 118 applicants

Numerous articles exist showing how qualified candidates can get past ATS “bots”. Why would those articles need to exist?



40-60% of companies cited a **lack of skills** as the barrier to hiring but they had received numerous applicants.

- NFIB (Jan '22) Forbes
May 17, 2022

The surplus of job seekers when boomers flooded the market created a “**ready made employee**” mindset. That did not exist prior to the boomer population.

From the 1950s to the early 70s, **only 15%** of the US population had **completed a 4 year degree**, so most management positions were filled by workers who had started at the very bottom of the organization.





What can YOU do?

The world is changing, change with it.



**Be an empathetic consultant
for your clients**



Your action items

- 1** Gain the trust of hiring managers by educating them
- 2** Educated hiring managers can often take your data to their companies to change reqs
- 3** If YOU are convinced, your strength in negotiations increases
- 4** A req that you helped shape will be a more fillable req.



Help your client understand risks and rewards.

Assign risk and tolerance levels.





Society Solutions

**Ease up on the message
that everyone needs to go
to college. Career
diversity is critical.**



A close-up, high-contrast photograph of a hand holding a pen, poised to write on an open book. The lighting is dramatic, with a strong orange-red glow from the top, casting deep shadows and highlighting the textures of the skin, the pen, and the paper. The background is dark and out of focus.

The Big Question

**Will labor force participation
increase in the future?**



Factors affecting Labor force participation into the future

Mix shift.

Aging boomers with lower LFPRs will pull the overall percentage down for awhile and then it will improve as they age out of the workforce

Wealth transfer.

Millennials will receive an estimated \$1.6T through wealth transfers from their boomer parents at an average of \$1.2M per family. This should drive more older millennials out of the labor force.

Elderly parent care.

As the population ranks of aging boomers swells and a lack of labor to work in nursing care facilities becomes more compounded, more adults will have to stop working to take care of their parents. Currently that number is 2M of those out of the labor force.



*“The labor force participation rate is projected to continue to trend down, declining from **61.7** percent in 2020 to **60.4** percent in 2030.”*

- BLS projections



Who does the work in the future will be determined by the actions we take now.





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SCAN



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