

The Power of a Diverse Mindset in Shaping Prosperity

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The Power of a Diverse Mindset in Shaping Prosperity

Abstract

Research spanning various disciplines underscores the significance of cultural diversity in facilitating cross-pollination of ideas, while diminishing social cohesiveness. Yet, the exploration of the impact of an equally intriguing dimension of diversity has remained uncharted: has the coalescence of diverse ancestral background in the formation of individuals' mindset shaped their productivity? Has a diverse mindset been central for individual's prosperity? This research advances the hypothesis that an intermediate level of diverse ancestral origins strikes a balance between the conflicting effects of cultural proximity and distinctiveness, creating an individual mindset that is conducive for productivity. While a limited cultural diversity among an individual's ancestors may reduce the scope for ancestral cross-pollination, and may diminish the individual's creativity, and adaptability, an extensive ancestral cultural divide could potentially hinder individual's coherence, human capital formation, and productivity. Leveraging the rich web of ancestries of the modern US population, we provide supporting evidence for the hypothesis and the underlying mechanism, establishing that there exists a hump-shaped relationship between intrapersonal diversity and earned income, mediated by the acquisition of human capital, in the form of educational attainment, originality, and flow of ideas.

JEL-Codes: D600, O100, Z100.

Keywords: mindset, diversity, culture, ancestry, productivity, human capital.

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1 Introduction

Migratory patterns that emerged in post-1500 era have heightened cross-cultural interactions, and contributed to the emergence of individuals with remarkably diverse ancestral roots. The coalescence of this rich cultural tapestry within individuals has inevitably fueled the evolution of intricate mindsets, which may have profoundly influenced human capital formation and prosperity.

Research spanning various disciplines underscores the significance of cultural diversity in shaping societal affluence. It highlights a delicate balance between the beneficial effects of diversity on innovation and adaptability, and the potential challenges it poses to social cohesiveness. Yet, while the influence of cultural diversity at the societal level has been extensively studied,¹ the impact of the intriguing intrapersonal dimension of diversity remains largely unexplored. Has the coalescence of diverse ancestral background in the formation of individuals' mindset shaped their productivity? Has a diverse mindset been central for individual's prosperity?

This research advances the hypothesis that an intermediate level of diverse ancestral origins strikes a balance between the conflicting effects of cultural proximity and distinctiveness in the formation of an individual mindset that is conducive for productivity. While a limited cultural diversity among an individual's ancestors may reduce the scope for cross-pollination, and may diminish the individual's creativity, and adaptability, an extensive ancestral cultural gap could potentially hinder individual's coherence, human capital formation, and ultimately, prosperity.

The empirical exploration of the proposed hypothesis requires a setup in which individuals are born and reside in the same country, but are originated from different combinations of ancestral origins. While these individuals would be exposed to the same economic forces and political institutions, they would be characterized by different levels of intrapersonal diversity.

The United States provides an exceptionally conducive environment for testing our hypothesis. Firstly, as a market economy, income differentials in the US are expected to mirror variations in productive traits. Secondly, the US population exhibits significant diversity in its ancestral origins, encompassing over a hundred ancestral national homelands. Thirdly, the availability of reliable individual-level data on earned income and self-reported ancestry for millions of US inhabitants enhances the robustness and scale of our analysis.

Thus, our research design leverages the rich web of ancestries of the modern US population to examine empirically our proposed hypothesis. We rely on individual-level data on labor

¹Alesina and Ferrara (2005), Ashraf and Galor (2013), Arbatli et al. (2020), Ashraf et al. (2021).

income and self-reported dual ancestry, available for millions of US workers, to explore the association between wage income and intrapersonal diversity. This research design crafts an empirical strategy that is: (a) resilient to concerns of reverse causality, (b) robust in the face of unobserved heterogeneity stemming from ancestral origins, gender, and age, and (c) insulated from selection bias.

In exploring the impact of diverse ancestral backgrounds on individual mindset and productivity, an essential consideration lies in the measurement of cultural distances between ancestral homelands. We introduce a novel metric that quantifies the cultural distance between the dual ancestries reported by individuals. Recognizing that cultural distance is a multifaceted concept evolving over time, we anchor our measure in one of the most enduring and fundamental determinants of cultural divergence: prehistoric migratory distances. These distances reflect the overland routes connecting the geographic centroids of ancestral societies and serve as proxies for the deep-rooted cultural disparities that have crystallized over millennia. Moreover, since modern national populations are typically composed of groups of individuals of different ancestries, the prehistoric migratory distance between a pair of national populations is captured by the weighted average of the migratory distances between each of its ancestral populations, accounting for the proportional representation of these ancestral populations in these modern nations. The findings suggest that intrapersonal diversity as captured by prehistoric migratory distance is a dominant measure relative to a range of alternative measures of cultural, linguistic, and religious distances in explaining the relationship between intrapersonal diversity and wage income.

The empirical analysis establishes that there exists indeed a hump-shaped relationship between intrapersonal diversity and wage income, which is robust for the inclusion of age, gender as well as primary and secondary ancestries fixed-effects. The wage maximizing level of intrapersonal (i.e., the peak of the hump), measured as the distance between ancestral origins, is about 7,400 km which is roughly the migratory distance between France and India. The impact of intrapersonal diversity on wage income is sizable: in the baseline specification, an increase in intrapersonal diversity from the lowest level in the sample to its wage maximizing level would increase wage income by nearly USD 6,000 (i.e., a 9.5% increase relative to the mean level of USD 62,365). Furthermore, a decrease in intrapersonal diversity from its wage maximizing level to the highest level in the sample would decrease wage income by roughly USD 14,500 (i.e., a 23% decrease relative to the mean level of wage income).

Consistent with our conceptual framework, the impact of intrapersonal diversity on wage income is mediated through its impact on two dimensions of human capital. First, the analysis suggests that there exists a hump-shaped relationship between intrapersonal diversity

and educational attainment, reflecting the beneficial effect of diverse parents on the creativity of their offspring, as well as the detrimental effect of a clash of parental styles and orientations on the effectiveness of their offspring’s human capital formation. Second, there exists a hump-shaped relationship between intrapersonal diversity and the level of originality and flow of ideas associated with an individual’s occupation, suggesting that a diverse ancestral background is conducive for creativity, but beyond a certain level it contributes to incoherence.

2 A Conceptual Framework

Suppose that the level of human capital, and thus productivity, is determined by a continuum of productive skills, $s(i)$, acquired by individuals during their formative years. Suppose further that the feasible range of these productive skills differs across individuals and is dictated by their mindset and openness to novel ideas and approaches. In particular, the feasible range of skills for each individual is increasing in the degree of diversity that is embodied in the individual (i.e., intrapersonal diversity), reflecting the extent of ancestral diversity in the individual’s family, $\psi \in [0, 1]$. Greater intrapersonal diversity, ψ , leads to a greater feasible range, $i \in [0, \psi]$, of productive skills, $s(i)$.²

The complementarity between the acquired productive traits, $s(i)$, $i \in [0, \psi]$, contributes to the potential human capital that the individual would be able to acquire. In particular, potential human capital, \hat{H} , of an individual with a level of intrapersonal diversity, ψ , is

$$\hat{H}(\psi) = \int_0^\psi s(i)^\theta di; \quad \theta \in (0, 1). \quad (1)$$

Suppose that individuals are endowed with 1 unit of time that is devoted, in their formative years, to the acquisition of productive skills, $s(i)$, from the feasible range $i \in [0, \psi]$. The time constraint faced by an individual with a level of intrapersonal diversity, ψ , is therefore

$$\int_0^\psi s(i) \leq 1. \quad (2)$$

where $s(i)$ is the time devoted to the acquisition of skill i .

Suppose further that individuals aspire to maximize their self-fulfillment and thus their potential human capital. Hence, in view of the existence of diminishing return to each productive skills, and the complementarity and the symmetry among them in the formation

²Our theoretical framework augments the cultural transmission underlay by Bisin and Verdier (2001) to account for diverse parental predispositions.

of human capital, individuals will allocate an equal share of their time endowment to each of these skills.

The time constraint implies therefore that, $\psi s(i) = 1$, and the amount of each skill i acquired by the individual is

$$s(i) = 1/\psi. \quad (3)$$

Hence, the time devoted by the individual to the acquisition of each productive skills, and thus the amount of each productive skills that the individual possesses is inversely related to the individual's level of intrapersonal diversity. The greater is the feasible range of productive skills, the lower is the time allocation for the acquisition of each productive skills.

The potential human capital of the individual is therefore

$$\hat{H}(\psi) = \int_0^\psi (1/\psi)^\theta di = \psi^{1-\theta}; \quad \theta \in (0, 1). \quad (4)$$

where $\hat{H}(\psi)$ is an increasing and strictly concave function of ψ . Namely, $\hat{H}'(\psi) > 0$ and $\hat{H}''(\psi) < 0$.

Although greater intrapersonal diversity increases the spectrum of acquired productive traits, ψ , and thus reduces that amount of each of these acquired skills, complementarity between these productive traits assures that the potential level of human capital, \hat{H} increases in the degree of diversity and generates self-fulfillment.

Yet, while the potential human capital generates self-fulfillment, it may not necessarily result in a higher earning capacity. Greater range of skills may lead to inattention and the lack of coherence, reducing the ability of individuals to fully utilize these productive skills. Suppose that intrapersonal diversity, ψ , diminishes the attention of individuals to each productive skills and their ability to exploit their entire potential. In particular, suppose that a fraction, ψ , of the aggregate impact of these productive skills on productive human capital is lost due to the lack of coherence or diffused attention resulting from the possession of a larger range of skills.³ The level of human capital, H , that the individual supplies in the labor market is therefore

$$H(\psi) = (1 - \psi) \int_0^\psi s(i)^\theta di = (1 - \psi)\psi^{1-\theta}; \quad \theta \in (0, 1). \quad (5)$$

Accordingly, if w is the return to a unit of human capital, the individual's earning ca-

³More generally, if intrapersonal diversity diminishes productive skills by $\alpha(\psi)$, where (a) $\alpha(1) = 1$, (b) $\alpha(0) < 1$, and (c) $\alpha(\psi)$ is non-decreasing and weakly convex in ψ in the interval $[\alpha(0), 1]$, the qualitative results would remain intact.

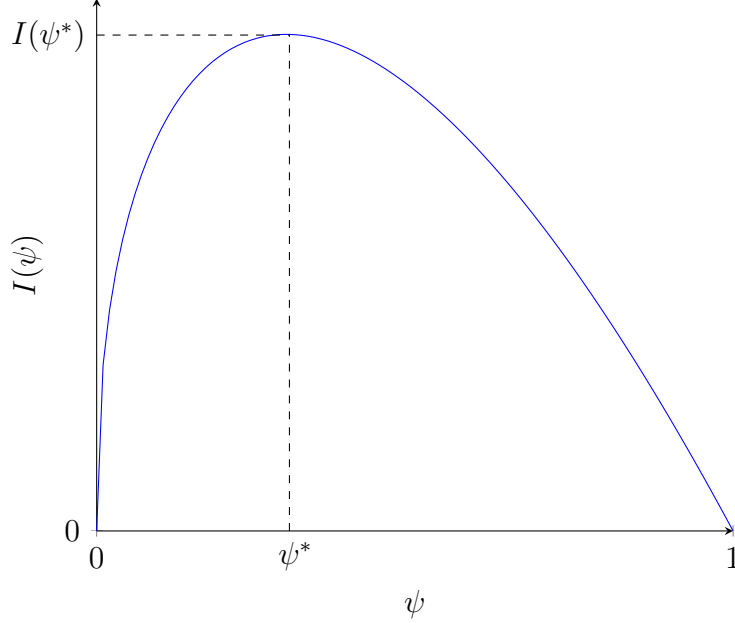


Figure 1. Individual’s earning capacity as a function of intrapersonal diversity

Notes: This figure depicts the hump-shaped relationship between an individual’s earning capacity and intrapersonal diversity as predicted by the conceptual framework. The figure is drawn for a degree of complementarity $\theta = 0.425$ but the existence of the hump is independent of the value of $\theta \in (0, 1)$.

capacity, $I(\psi)$, is therefore

$$I(\psi) = w(1 - \psi)\psi^{1-\theta}; \quad \theta \in (0, 1). \quad (6)$$

Since $I(\psi)$ is strictly concave in the degree of diversity, ψ , and since $I'(0) > 0$ and $I'(1) < 0$, as depicted in Figure 1, there exists an intermediate level of diversity, $\psi^* \in (0, 1)$, that maximizes the individual level of income.⁴

The model suggests therefore that the degree of coalescence of diverse ancestral origins within an individual affects the individual’s mindset and productivity. This embodied, intrapersonal, diversity generates conflicting effects on individual’s productivity. A diverse ancestral background is conducive for creativity and adaptability, enhancing individual’s productivity. However, a wide cultural divide among individual’s ancestors hinders coherence, and the ability to focus on a given tasks, reducing productivity. In particular, an

⁴Intrapersonal diversity that exceeds the wage maximizing level, could potentially lead to strategic choices that may limit the acquired range of skills and may permit the individual to reach the wage maximizing number of skills. Nevertheless, the individual mindset generates the desirable preference for diverse skills and operating against this quest is prohibitively costly, in terms of the desire for self-fulfillment. The choice of academic disciplines, for instance, is affected by the individual mindset rather than purely by the potential earning capacity. Similarly, it is assumed that for individuals who have a low level of intrapersonal diversity, the acquisition of a wider range of skills is prohibitively costly.

intermediate level of diverse ancestral origins strikes a balance between cultural proximity and distinctiveness, creating a mindset that is conducive for productivity.

3 Data and Empirical Strategy

The proposed hypothesis implies that there exists a hump-shaped relationship between intrapersonal diversity and human capital, broadly defined, as well as between intrapersonal diversity and wage income.

Thus, our research design leverages the rich web of ancestries of the modern US population to examine empirically our proposed hypothesis. We estimate the association between intrapersonal diversity and wage income, using earned income data, self-reported dual ancestry, and demographic characteristics from the American Community Survey (ACS) 2010 and 2020 (5-year samples), as well as the Censuses for the years 1980, 1990, and 2000, yielding samples of nearly a million individuals from more than hundred ancestries.

Our baseline sample consists of US-born, full-time, year-round wage workers in the labor force who are between 25 and 64 years old.⁵ The qualitative results are unaffected when considering broader sample criteria: (i) individuals between 16 and 64 years old (Table C.1), and (ii) individuals who are not full-time, year-round workers (Table C.2).

3.1 The Measurement of Intrapersonal Diversity

In investigating the influence of diverse ancestral backgrounds on individual mindset and productivity, a crucial aspect lies in measuring the cultural distances between ancestral homelands. We introduce a metric that quantifies the cultural distance between the primary and secondary ancestral origins of individuals.⁶ In view of the designation of ancestries as primary and secondary, we do not consider an ancestry pair as symmetric in our baseline empirical implementation.⁷

Understanding that cultural distance is multifaceted and evolves over time, our metric is grounded in one of the most enduring determinants of cultural divergence: prehistoric migratory distances. These distances represent the overland routes connecting ancestral societies, serving as proxies for the deep-seated cultural disparities that have developed

⁵Given that human capital accumulation is one of our outcomes of interest, we restrict our baseline sample to those individuals who are at least 25 years old since their human capital formation is largely completed.

⁶Individuals who report a single ancestry are excluded from the baseline analysis since the absence of a secondary ancestry may either reflect a measurement error or homogeneous lineages. Reassuringly, the qualitative results are unaffected by the inclusion of these individuals as shown in Table C.3.

⁷As established in Table C.4, considering the ancestry pair as symmetric does not qualitatively affect our results.

among them over millennia. Moreover, as modern national populations typically consist of individuals with diverse ancestries, the prehistoric migratory distance between a pair of national populations is computed as the weighted average of migratory distances between each ancestral population, accounting for their proportional representation in these modern nations.⁸

Importantly, as established in Table 3 and C.8, in elucidating the relationship between intrapersonal diversity and wage income, prehistoric migratory distance emerges as a dominant measure compared to various alternative metrics of cultural, linguistic, and religious distances as well as alternative pairwise distances in geographical characteristics that may impact cultural distances, such as caloric suitability, latitude, ruggedness, temperature and precipitation.

3.2 Empirical Strategy

The research designs an innovative empirical strategy that is: (a) resistant to reverse causality issues, (b) robust to unobserved heterogeneity due to ancestral origins, gender, and age, and (c) shielded from selection bias.

First, leveraging variations in the prehistoric migratory distance between ancestral origins to predict intrapersonal diversity implies that our empirical strategy is immune from concerns about reverse causality;⁹ namely, contemporary income in the US could not affect predicted intrapersonal diversity.

Second, to mitigate concerns about omitted variables bias, the analysis account for both the primary and the secondary ancestry fixed-effects, as well as age and gender fixed-effects. Thus, we account for the potential impact of unobserved heterogeneity, at either of the two ancestral origins, on human capital formation and wage income of descendants in the US, which means that omitted variable bias is highly improbable since it could result only from an unobserved heterogeneity at the pairwise level.

Third, in light of the potential spatial correlation in shocks across ancestral homelands that led to migration into the US, our analysis could be affected by selection bias. Countries closer to each other are more likely to experience similar shocks, and if these shocks generate negative selective migration to the US in terms of productive capacity, then shorter migratory distance between ancestral origins would be correlated with lower earning capacity.

⁸This adjustment is based on the migration matrix of Putterman and Weil (2010) that maps contemporary populations to their ancestral homeland in the year 1500.

⁹This premise is based on the understanding that long-established migratory trajectories are exogenous to an individual's current productivity levels. Furthermore, it is implausible that individuals' labor market performance would influence their reported ancestry in a manner that would systematically affect the selection of ancestral *pairs* in a way that could bias our results.

However, this concern is not applicable in the case of positive selection in terms of productive capacity. Yet, even in the presence of negative selection, the impact of migratory distance, and therefore, intrapersonal diversity, on productivity would be monotonic rather than the observed hump-shaped relationship.

Another source of selection would be if cultural distance between ancestral homelands proxies higher skills and abilities for ancestors. If people have a comparative advantage marrying within their own culture, then higher migratory distance would be correlated with high ability. This concern which would generate a monotonic effect, however, is inconsistent with the observed non-linear relationship between ancestral cultural distance and individual productivity.

3.3 The Empirical Model

Following our hypothesis, we model wage income as a quadratic function of intrapersonal diversity. The model accounts for gender, age, primary ancestry, and secondary ancestry fixed effects.

In particular, we estimate the following OLS model:

$$\ln W_{i,g,a,p,s} = \alpha + \beta_1 \psi_{p,s} + \beta_2 \psi_{p,s}^2 + \gamma_p + \gamma_s + \gamma_g + \gamma_a + \epsilon_i,$$

where the dependent variable $\ln W_{i,g,a,p,s}$ is the natural log of the wage income of individual i of the gender, g , and age, a , whose ancestral homelands are p and s . The independent variable, $\psi_{p,s}$, is the intrapersonal diversity, reflecting the weighted migratory distance between the primary ancestry p and the secondary s . In addition, γ_p are primary ancestry fixed-effects, γ_s are secondary ancestry fixed-effects, γ_g are gender fixed-effects, and γ_a are age fixed-effects. Since the main independent variable, $\psi_{p,s}$, is derived from both primary and secondary ancestries, standard errors are clustered two-way at the level of primary and secondary ancestries to account for potential within primary ancestry and within secondary ancestry correlations in the error terms that is not captured by the fixed effects.

The coefficients of interest, β_1 and β_2 , are hypothesized to be positive and negative respectively in view of the predicted hump-shaped relationship between intrapersonal diversity and wage income.

4 Main Findings

4.1 Intrapersonal Diversity and Wage Income: The Baseline Analysis

This section explores the association between intrapersonal diversity and wage income, using earned income data, self-reported dual ancestry, and demographic characteristics from the ACS 2010 5-year sample.¹⁰

Table 1 reports the baseline analysis, as depicted in Figure 2. The estimated effect in Column (1) indicates that there exists indeed a hump-shaped relationship between intrapersonal diversity and wage income, accounting for primary and secondary ancestry fixed-effects. Moreover, this baseline estimated effect remains highly significant statistically if we account in addition for the individual’s age fixed effects (Column (2)), and age and gender fixed effects (Column (3)). The wage maximizing level of intrapersonal (i.e., the peak of the hump), measured as the distance between the individual’s ancestral origins, is about 7,400 km which is roughly the migratory distance between France and India.¹¹

The impact of intrapersonal diversity on wage income is sizable. In particular, Column (3), which is our preferred specification, suggests that an increase in intrapersonal diversity from the bottom of its empirical distribution to its wage maximizing level would increase wage income by nearly USD 6,000 (i.e., a 9.5% increase relative to the mean level of USD 62,365). It also implies that a decrease in intrapersonal diversity from the top of its empirical distribution to its wage maximizing level would decrease wage income by roughly USD 14,500 (i.e., a 23% decrease relative to the mean level of wage income).

These baseline findings are unaffected qualitatively by: (a) including individuals between 16 and 25 years old (Table C.1), (b) including individuals who are not full-time year-round workers (i.e., those employed fewer than 35 hours per week, and working less than 50 weeks per year) (Table C.2), (c) including individuals who report a single ancestry and can arguably be viewed as having zero intrapersonal diversity (Table C.3), (d) considering the ancestry pair as symmetric (Table C.4), (e) not accounting for either the primary and secondary ancestry fixed-effects, or both (Table C.5), and (f) samples that consist exclusively of male or female (Table C.6).

¹⁰Income reported in the ACS 5-year samples for 2020 is likely to be affected by Covid-19 and is therefore not used for the baseline analysis. It is included in the exploration of the association between intrapersonal diversity and wage income in a repeated cross section over the period 1980-2020.

¹¹In addition, a non-parametric test proposed by Lind and Mehlum (2010) suggests that the hump-shaped relationship between intrapersonal diversity and wage income is highly statistically significant.

Table 1. Intrapersonal Diversity and Wage Income

	LOG WAGES		
	(1)	(2)	(3)
Intrapersonal diversity	0.25*** (0.067)	0.31*** (0.070)	0.27*** (0.059)
Intrapersonal diversity (squared)	-0.17*** (0.046)	-0.21*** (0.048)	-0.18*** (0.042)
Primary ancestry FE	✓	✓	✓
Secondary ancestry FE	✓	✓	✓
Age FE		✓	✓
Sex FE			✓
Dep. var. mean	62,365	62,365	62,365
Observations	909,926	909,926	909,926
Primary ancestral homelands	109	109	109
Secondary ancestral homelands	106	106	106
Adjusted R^2	0.026	0.066	0.12
Wage maximizing migratory distance (km)	7284***	7551***	7436***
Wage(ψ^*)-Wage(ψ_{min})	5597	7028	5917
Wage(ψ^*)-Wage(ψ_{max})	14693	16362	14570

Notes: This table establishes that there exists a hump-shaped relationship between intrapersonal diversity and wage income, accounting cumulatively for primary and secondary ancestry fixed-effects (Column (1)), age fixed-effects (Column (2)), and gender fixed-effects (Column (3)). Two-way standard errors (clustered at the primary ancestry level and at the secondary ancestry level) are reported in parentheses. ψ^* denotes the wage maximizing level of migratory distance; ψ_{min} denotes the lowest level of migratory distance in the sample; ψ_{max} denotes the highest level of migratory distance in the sample. *** Significant at the 1 percent level.

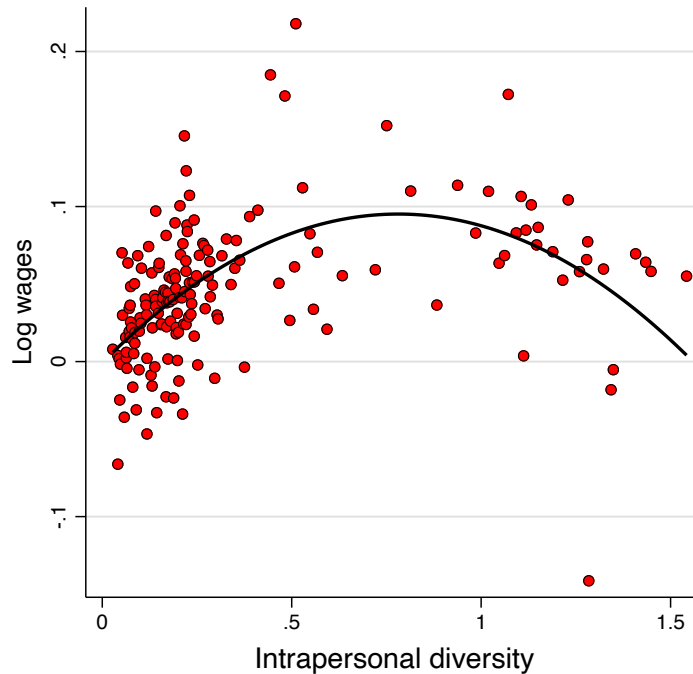


Figure 2. Intrapersonal Diversity and Wage Income

Notes: This figure depicts the estimated hump-shaped association between intrapersonal diversity and wage income, as reported in Column (3) of Table (1).

4.2 Intrapersonal Diversity and Wages: Repeated Cross-Section

Table 2 shows that the patterns established in Table 1, based on data from the ACS 2010 5-year sample, are unaffected qualitatively in repeated cross section over the period 1980-2020, using the Censuses of 1980, 1990, and 2000, and the ACS 2010 and 2020 5-year samples.¹² Moreover, as established in Table C.7, the qualitative pattern relationship remains significant in each of these decades.¹³

¹²Censuses prior to 1980 are not included in the repeated cross-section analysis for three reasons. First, they do not include the critical information about ancestry. While they do include information on parental birthplace, this limits the sample to only second-generation migrants, distorting the sample consistency. In addition, these individuals are less likely to be integrated into the US labor market. Second, since a sample of second-generation migrants is significantly smaller, an analysis based solely on second-generation migrants would be plagued by significantly larger measurement errors. Third, the distortionary effects of unions is significantly more pronounced in the three decades prior to 1980, as unionization rates ranged from 25% to 35%.

¹³An increase in the rewards to diversity in a rapidly changing technological environment, as well as the decline in unionization rates from over 20% in 1980 to about 10% in 2020, could be associated with the increase in the wage maximizing level of diversity over part of this period.

Table 2. Intrapersonal Diversity & Wages: Repeated Cross-Section, 1980-2020

	LOG WAGES		
	(1)	(2)	(3)
Intrapersonal diversity	0.23*** (0.061)	0.30*** (0.066)	0.25*** (0.055)
Intrapersonal diversity (squared)	-0.16*** (0.043)	-0.20*** (0.046)	-0.17*** (0.040)
Sample FE	✓	✓	✓
Primary ancestry FE	✓	✓	✓
Secondary ancestry FE	✓	✓	✓
Age FE		✓	✓
Sex FE			✓
Dep. var. mean	50,453	50,453	50,453
Observations	3,877,894	3,877,894	3,877,894
Primary ancestral homelands	134	134	134
Secondary ancestral homelands	132	132	132
Adjusted R^2	0.32	0.34	0.38
Wage maximizing migratory distance (km)	7319***	7544***	7406***
Wage(ψ^*)-Wage(ψ_{min})	3883	5153	4134
Wage(ψ^*)-Wage(ψ_{max})	10376	12359	10617

Notes: This table establishes that there exists a hump-shaped relationship between intrapersonal diversity and wage income over the period 1980-2020, accounting cumulatively for sample as well as primary and secondary ancestry fixed-effects (Column (1)), age fixed-effects (Column (2)), and gender fixed-effects (Column (3)). Two-way standard errors (clustered at the primary ancestry level and at the secondary ancestry level) are reported in parentheses. ψ^* denotes the wage maximizing level of migratory distance; ψ_{min} denotes the lowest level of migratory distance in the sample; ψ_{max} denotes the highest level of migratory distance in the sample. *** Significant at the 1 percent level.

4.3 Alternative Measures of Cultural Distance

In exploring the impact of diverse ancestral backgrounds on individual mindset and productivity, an essential consideration lies in the measurement of cultural distances between ancestral homelands. Cultural distance can be assessed through various lenses, and determining which measure of cultural distance is the most influential becomes an important aspect of this research.

One approach to measuring cultural distance is through linguistic differences (Desmet et al., 2009). Language is a fundamental carrier of culture, and variations in linguistic characteristics can signify important distinctions in the exposure of individuals to cultural production. Another avenue for gauging cultural distance is through religious differences (Spolaore and Wacziarg, 2009). Different ancestral homelands may have distinct religions, reflecting different narratives, rituals, and customary practices. These differences might influence individuals' mindset and world views. Yet another feasible metric for culture distance is genetic distance (Spolaore and Wacziarg, 2009), reflecting time elapsed since two populations' last common ancestors and therefore their cultural distinction.

Table 3 establishes that in explaining the association between interpersonal diversity, as capture by cultural distance, and wage income, prehistoric migratory distance is a dominant measure of cultural distance relative to a range of alternative cultural distances. Columns (2)-(3) consider the influence of linguistic distance, Columns (4)-(5) account for religious distance, Columns (7)-(8) consider the potential impact of genetic distance, and Columns (9)-(10) account for differential cultural distance based on the contiguity of two ancestral homelands. In particular, the table suggests that in interpersonal diversity, as captured by prehistoric migratory distance, dominates the horse race with linguistic distance (Column (3)), religious distance (Column (5)), and genetic distance (Column (8)), remaining high significant through while the relationship of wage income with each of the alternative measures is insignificant.

Moreover, as established in Table C.8, in elucidating the relationship between intrapersonal diversity and wage income, prehistoric migratory distance emerges as a dominant measure compared to alternative pairwise distances in geographical characteristics that may impact cultural distances, such as caloric suitability, latitude, ruggedness, temperature and precipitation.

Table 3. Intrapersonal Diversity & Wage Income: Horse-Race with Alternative Measures of Cultural Distances

	LOG WAGES									
	(1)	(2)	(3)	(4)	(5)	(6)	(7)	(8)	(9)	(10)
Intrapersonal diversity	0.27*** (0.062)		0.28*** (0.058)		0.24*** (0.043)	0.27*** (0.060)		0.26*** (0.061)		0.30*** (0.086)
Intrapersonal diversity (squared)	-0.18*** (0.044)		-0.19*** (0.041)		-0.16*** (0.029)	-0.18*** (0.043)		-0.18*** (0.044)		-0.20*** (0.056)
Linguistic distance		0.0061 (0.0061)	0.0073 (0.0048)							
Linguistic distance (squared)		-0.00035 (0.00033)	-0.00040 (0.00026)							
Religious distance				-0.017* (0.0099)	-0.011 (0.0084)					
Religious distance (squared)				0.0038** (0.0017)	0.0026* (0.0014)					
Genetic distance						0.10** (0.051)	0.023 (0.042)			
Genetic distance (squared)						-0.057 (0.037)	-0.013 (0.035)			
Contiguous homelands									-0.011** (0.0055)	0.0058 (0.0072)
Dep. var. mean	62,326	62,326	62,326	62,326	62,326	62,294	62,294	62,294	62,294	62,294
Observations	899,076	899,076	899,076	899,076	899,076	904,749	904,749	904,749	904,749	904,749
Primary ancestral homelands	98	98	98	98	98	104	104	104	104	104
Secondary ancestral homelands	95	95	95	95	95	101	101	101	101	101
Adjusted R^2	0.12	0.12	0.12	0.12	0.12	0.12	0.12	0.12	0.12	0.12
Wage maximizing migratory distance (km)	7411***		7484***		7493***	7426***		7378***		7577***
Wage(ψ^*)-Wage(ψ_{min})	6009		6275		5345	5841		5695		6693
Wage(ψ^*)-Wage(ψ_{max})	14921		15107		12971	14451		14381		15480

Notes: This table establishes that intrapersonal diversity as captured by prehistoric migratory distance is a dominant measure relative to a range of alternative measures of cultural, linguistic, and religious distances in explaining the relationship between intrapersonal diversity and wage income. All specifications account for primary and secondary ancestry as well as age and gender fixed-effects. Two-way standard errors (clustered at the primary ancestry level and at the secondary ancestry level) are reported in parentheses. ψ^* denotes the wage maximizing level of migratory distance; ψ_{min} denotes the lowest level of migratory distance in the sample; ψ_{max} denotes the highest level of migratory distance in the sample. *** Significant at the 1 percent level. ** Significant at the 5 percent level. * Significant at the 10 percent level.

5 Mediating Channels

This section explores the mechanism through which intrapersonal diversity influences wage income. As implied by our conceptual framework, the impact of intrapersonal diversity on wage income is plausibly operating via the effect of intrapersonal diversity on various dimensions of human capital.

While our data does not provide us with direct measures of skills and psychological traits across individuals, it does enable us to explore closely related mediating channels. Namely, the impact of intrapersonal diversity on: (a) educational attainment, and (b) the level of

originality and flow of ideas associated with an individual’s occupation.

In line with our theoretical framework, the influence of intrapersonal diversity on wage income can be understood through its impact on two aspects of human capital. Firstly, our analysis reveals a hump-shaped relationship between intrapersonal diversity and educational achievement. This reflects the positive influence of diverse parental backgrounds on the creativity of their children, as well as the negative impact of conflicting parental styles and orientations on the effectiveness of their offspring’s human capital development. Secondly, we observe a similar hump-shaped relationship between intrapersonal diversity and the level of originality and idea generation within an individual’s profession. This suggests that a diverse ancestral heritage fosters creativity, but beyond a certain point, it may lead to a lack of coherence in one’s ideas and work.

5.1 Educational Attainment

The diversity in parental backgrounds often gives rise to contrasting effects on their children’s educational achievements. A significant cultural gap between parents tends to foster a positive impact on their offspring’s creativity and the broadening of their perspectives. However, when conflicting parental styles and orientations come into play, they can result in a lack of coherence, which in turn has adverse effects on the effectiveness of their children’s development of human capital. Thus one would expect a hump-shaped relationship between intrapersonal diversity and educational attainment.

Reassuringly, in line with the proposed hypothesis, as depicted in Figure 3 (based on Columns (2) of Table 4), there exists a hump-shaped relationship between intrapersonal diversity and educational attainment.

Moreover, it appears that education attainment is mediating some of the effect on intrapersonal diversity on economic prosperity. Table 4 presents the mediating regressions. Column (1) reports the benchmark reduced-form association between intrapersonal diversity and wage income. Column (2) reports a statistically significant hump-shaped association between intrapersonal diversity and educational attainment. Furthermore, Column (3) suggests that educational attainment has indeed a positive and statistically significant association with wage income. Importantly, consistent with the view that education is indeed a mediating channel, the point estimates of the effect of intrapersonal diversity on wage income drop as compared to the reduced-form estimates. Although the wage maximizing level of intrapersonal (i.e., the peak of the hump) is roughly unaltered, the estimates suggest that an increase in intrapersonal diversity from the bottom of its empirical distribution to its wage maximizing level would increase wage income by nearly USD 3,300, which is considerably

smaller than the estimated baseline effect of USD 6,000. It also implies that a decrease in intrapersonal diversity from its wage maximizing level to the top of its empirical distribution would decrease wage income by roughly USD 8,500, which is around 60% of the baseline effect of USD 14,500.

Table 4. Mediating Channels: Human Capital Accumulation

	EDUCATIONAL		
	LOG WAGES	ATTAINMENT	LOG WAGES
	(1)	(2)	(3)
Intrapersonal diversity	0.27*** (0.059)	0.41*** (0.13)	0.16*** (0.028)
Intrapersonal diversity (squared)	-0.18*** (0.042)	-0.27*** (0.084)	-0.11*** (0.021)
Educational attainment			0.27*** (0.0019)
Dep. var. mean	62,365		62,365
Observations	909,926	909,926	909,926
Primary ancestral homelands	109	109	109
Secondary ancestral homelands	106	106	106
Adjusted R^2	0.12	0.050	0.28
Outcome maximizing migratory distance (km)	7436***	7494***	7395***
Wage(ψ^*)-Wage(ψ_{min})			3274
Wage(ψ^*)-Wage(ψ_{max})			8475

Notes: This table establishes that there exists a hump-shaped relationship between intrapersonal diversity and educational attainment. All specifications account for primary and secondary ancestry as well as age and gender fixed-effects. Two-way standard errors (clustered at the primary ancestry level and at the secondary ancestry level) are reported in parentheses. ψ^* denotes the wage maximizing level of migratory distance; ψ_{min} denotes the lowest level of migratory distance in the sample; ψ_{max} denotes the highest level of migratory distance in the sample. *** Significant at the 1 percent level.

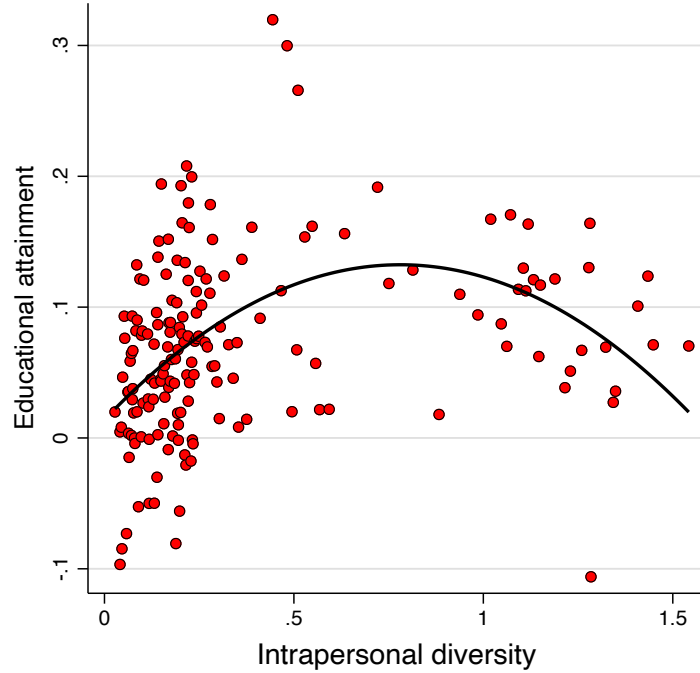


Figure 3. Intrapersonal Diversity and Educational Attainment

Notes: This figure depicts the association between intrapersonal diversity and educational attainment of an individual.

Since the estimated association between intrapersonal diversity and wage income remains highly significant, even after accounting for educational attainment, it suggests that although diverse ancestral origins might be associated with the conflicting implications of parental styles and orientations on the offspring’s schooling, the coalescence of diverse ancestral backgrounds in the formation of individuals’ mindset induces the consolidation of a creative and flexible mindset which is conducive to higher productivity, and therefore earnings, beyond educational investment.¹⁴

5.2 Cognitive Flexibility

As suggested by our conceptual framework, diverse ancestral heritage fosters creativity, but beyond a certain level it may lead to incoherence. The proposed hypothesis suggest therefore a hump-shaped relationship between intrapersonal diversity and the level of originality and idea generation that characterizes the individual’s profession.

¹⁴Table C.9 further corroborates this claim by establishing that the hump-shaped relationship holds even when including education fixed-effects, and therefore leveraging variation across individuals with the same educational attainment.

Indeed, in line with the proposed hypothesis, as depicted in Figure 4 (based on Columns (2) of Table 5), there exists a hump-shaped relationship between intrapersonal diversity and cognitive flexibility.

Moreover, it appears that these manifestations of human capital mediate some of the effect on intrapersonal diversity on economic prosperity. Table 5 presents the mediating regressions. Column (1) reports the benchmark reduced-form association between intrapersonal diversity and wage income. Columns (2) and (4) report a statistically significant hump-shaped association between intrapersonal diversity and originality and flow of ideas. Furthermore, as expected, Columns (3) and (5) suggest that originality and flow of ideas have indeed a positive and statistically significant association with wage income.

Moreover, consistent with the view that these are only mediating channels, the point estimates of the effect of intrapersonal diversity on wage income drop as compared to the reduced-form estimates. Although the wage maximizing level of intrapersonal (i.e., the peak of the hump) is roughly unaltered, the estimates suggest that an increase in intrapersonal diversity from the bottom of its empirical distribution to its wage maximizing level would increase wage income by nearly USD 4,000, which is considerably smaller than the estimated baseline effect of USD 6,000. It also implies that a decrease in intrapersonal diversity from its wage maximizing level to the top of its empirical distribution would decrease wage income by roughly USD 11,000, which is around 75% of the baseline effect of USD 14,500.

Table 5. Mediating Channel: Cognitive Flexibility

	LOG WAGES	ORIGINALITY	LOG WAGES	FLOW OF IDEAS	LOG WAGES
	(1)	(2)	(3)	(4)	(5)
Intrapersonal diversity	0.28*** (0.058)	2.84*** (0.61)	0.21*** (0.045)	2.98*** (0.64)	0.20*** (0.042)
Intrapersonal diversity (squared)	-0.19*** (0.043)	-1.77*** (0.42)	-0.14*** (0.033)	-1.89*** (0.44)	-0.13*** (0.032)
Originality			0.026*** (0.00033)		
Flow of ideas					0.029*** (0.00035)
Dep. var. mean	62201.2	41.7	62201.2	42.9	62201.2
Observations	620,205	620,205	620,205	620,205	620,205
Primary ancestral homelands	105	105	105	105	105
Secondary ancestral homelands	102	102	102	102	102
Adjusted R^2	0.11	0.018	0.26	0.021	0.28
Outcome maximizing migratory distance (km)	7548***	8008***	7402***	7897***	7403***
Wage(ψ^*)-Wage(ψ_{min})	6339		4458		4124
Wage(ψ^*)-Wage(ψ_{max})	14878		11317		10509

Notes: This table establishes that there exists a hump-shaped relationship between intrapersonal diversity and cognitive flexibility as captured by the level of originality and flow of ideas associated with an individual's occupation. All specifications account for primary and secondary ancestry as well as age and gender fixed-effects. Two-way standard errors (clustered at the primary ancestry level and at the secondary ancestry level) are reported in parentheses. ψ^* denotes the wage maximizing level of migratory distance; ψ_{min} denotes the lowest level of migratory distance in the sample; ψ_{max} denotes the highest level of migratory distance in the sample. *** Significant at the 1 percent level.

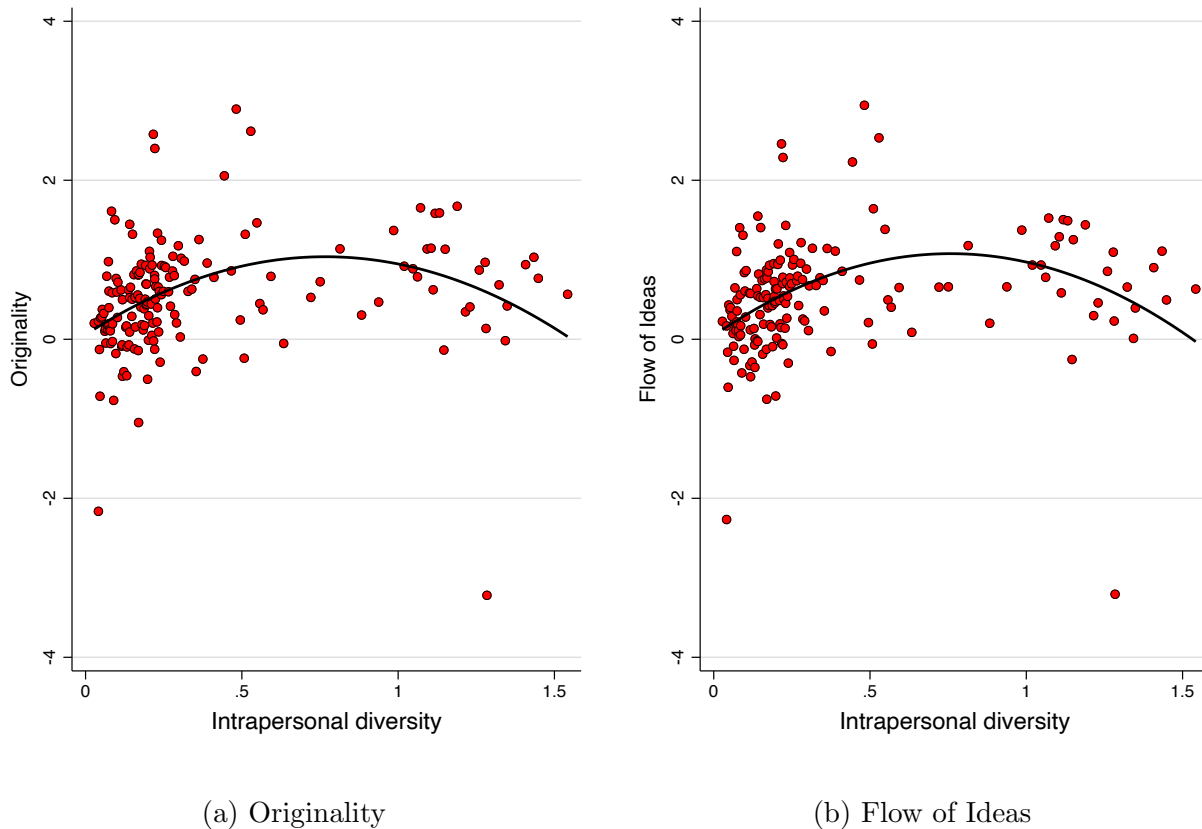


Figure 4. Intrapersonal Diversity and Cognitive Flexibility

Notes: This figure depicts the association between intrapersonal diversity and cognitive flexibility as captured by the level of originality and flow of ideas associated with an individual’s occupation.

6 Concluding Remarks

This research introduces a fresh perspective on an unexplored facet of diversity: intrapersonal diversity, shaped by the coalescence of diverse ancestral backgrounds in shaping an individual’s mindset. We propose the hypothesis that an intermediate level of diverse ancestral origins strikes a delicate balance between the conflicting influences of cultural diversity, creating an individual mindset that is conducive for productivity. While limited cultural diversity among an individual’s ancestors may restrict the opportunities for cross-cultural pollination and potentially reduce creativity and adaptability, an extensive cultural divide among ancestors could hinder coherence, impede human capital formation, and affect an individual’s productivity.

Leveraging extensive micro-data encompassing millions of individuals born in the United States, representing more than a hundred distinct ancestral backgrounds, our research pro-

vides empirical support for our hypothesis. The evidence suggest that indeed an intermediate level of intrapersonal diversity is conducive for economic prosperity. The wage-maximizing level of intrapersonal diversity, measured as the prehistoric migratory distance between ancestral origins, is approximately 7,400 kilometers; equivalent to the distance between France and India. The impact of intrapersonal diversity on wage income is substantial, indicating that an increase in intrapersonal diversity from the lower end of its empirical distribution to its wage-maximizing level would result in a nearly USD 6,000 increase in wage income, relative to the average income level of USD 62,365. It also implies that a decrease in intrapersonal diversity from the top of its empirical distribution to its wage maximizing level would decrease wage income by roughly USD 14,500.

In alignment with our conceptual framework, intrapersonal diversity’s impact on wage income can be understood through its influence on two aspects of human capital. Firstly, our analysis indicates the presence of a hump-shaped relationship between intrapersonal diversity and educational attainment. This pattern reflects the positive influence of diverse parental backgrounds on their offspring’s creativity, while also highlighting the negative impact of conflicting parental styles and orientations on the effectiveness of human capital formation. Secondly, we observe a similar hump-shaped relationship between intrapersonal diversity and the level of originality and idea generation within an individual’s profession. This suggests that a diverse ancestral background fosters creativity, but beyond a certain point, it may contribute to incoherence.

The findings highlight the importance of adopting a nuanced approach in navigating the realms of human capital development and productivity enhancement. This approach acknowledges the dual nature of skill development, emphasizing the need to cultivate a diverse range of abilities while remaining mindful of the potential downsides of excessive skill acquisition. Achieving a balance between the pursuit of a broad skill set and an understanding of context-specific requirements is crucial for promoting educational outcomes tailored to the distinct characteristics of each community.

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A Variable Definitions and Sources

A.1 Ancestral Homeland

- Self-reported ancestry of the US population. Individuals are asked to self-report their primary ancestry (typically a country of origin). We leverage this information to match them to modern national homelands.¹⁵ We follow the coding of the variable

¹⁵While respondents are allowed to report a secondary ancestry, in our sample, 53% do not indicate a secondary ancestry. The most common dual ancestry in the sample are European ancestry pairs (e.g., German-Irish, English-German, English-Irish), representing locations that have relatively similar migratory distance from Africa. The exclusion of individuals who report a secondary ancestry has not qualitative impact.

”ancestr1d” (i.e., detailed ancestry, first response) in IPUMS USA to match the self-reported ancestry to a modern national boundary, where the set of nations is based on the classification of the World Bank Development Indicators.¹⁶ If IPUMS does not match an ancestry to a modern national boundary we establish the following assignment criteria: (i) if the ancestry is assigned unambiguously by historical sources to a unique modern national homeland, then we follow this assignment (e.g., Cornish and Manx as part of the United Kingdom), (ii) if the ancestry is a former nation that split up (e.g., Czechoslovakia and Yugoslavia), we match the ancestry to the contemporary country of the historical capital, (iii) if the ancestry is an ethnic group (that is not mapped by IPUMS to a modern nation), we use the assignment provided by the Ethnographic Atlas (e.g., Kurds and Lapps), (iv) if the group is not in the Ethnographic Atlas (e.g., Cossack), then we match it to the closest capital of a contemporary country where this group is currently located, (v) individuals who report an ancestry which can not be mapped into an a unique ancestral homeland (e.g. African-Americans) are excluded from the analysis. Data Source: Authors’ assignment based on [Ruggles et al. \(2023\)](#).

A.2 Main outcome

- **Wage income:** Each individual’s wage income as coded on the variable ”incwage”. Data Source: [Ruggles et al. \(2023\)](#).

A.3 Independent Variable - Intrapersonal Diversity

- **Migratory Distance Between a Pair of Ancestral Origins:** The great circle distance along a land-restricted path from the geodesic centroid of the primary ancestral homeland to the geodesic centroid of the secondary ancestral homeland. Data Source: Authors’ computation.¹⁷

¹⁶Based on WDI, Hong Kong, Macau, and Palestine are considered nations. The only exception is Taiwan which we classified as an additional cluster following the convention (e.g., Putterman and Weil 2010). The exclusion of Taiwan or its inclusion within China would slightly strengthen our results.

¹⁷Since an ancestral homeland may consist of populations which are themselves from different ancestries, our measure captures the weighted average of the migratory distances from each population in the primary ancestral homeland to each population in the secondary ancestral homeland, accounting for the proportional representation of these deeper ancestral populations in the ancestral homeland, using the migration matrix of [Putterman and Weil \(2010\)](#). If the ancestral homeland is not in the matrix, we keep the unadjusted migratory distance only if the homeland is in the Old World given the drastical changes in the composition of populations of the New World in the post-1500 period.

A.4 Fixed-Effects

- **Sex:** Each individual's sex. Data Source: [Ruggles et al. \(2023\)](#).
- **Age:** Each individual's age. Data Source: [Ruggles et al. \(2023\)](#).
- **Sample:** The repeated cross-section include five different samples: Censuses of 1980, 1990, and 2000 as well as ACS 5-year samples of 2010 and 2020. Data Source: [Ruggles et al. \(2023\)](#).

A.5 Alternative Cultural Distances

- **Genetic distance:** The F_{st} measure of genetic relatedness of a pair of ancestral origins. Data Source: [Spolaore and Wacziarg \(2009\)](#).
- **Linguistic distance:** The number of common nodes in the linguistic tree shared by languages spoken by plurality groups within each ancestral origin in a pair. Data Source: [Spolaore and Wacziarg \(2009\)](#).
- **Religious distance:** The number of common classifications in the nomenclature of world religions shared by religions of the plurality groups within each ancestral origin in a pair. Data Source: [Spolaore and Wacziarg \(2009\)](#).
- **Contiguous homelands:** A dummy variable that captures whether the ancestral origins of an individual are contiguous countries. Data Source: [Spolaore and Wacziarg \(2009\)](#).

A.6 Absolute Difference in Geography

- **Latitude:** The absolute difference in the latitude of the geodesic centroid of the ancestral origins of an individual. Data Source: Authors' computation.
- **Caloric suitability:** The absolute difference in the average and standard deviation of caloric suitability within the territory of the ancestral origins of an individual. Data Source: Authors' computation based on [Galor and Özak \(2016\)](#).
- **Temperature:** The absolute difference in the average and standard deviation of temperature within the territory of the ancestral origins of an individual. Data Source: [Mitchell et al. \(2004\)](#).

- **Precipitation:** The absolute difference in the average and standard deviation of precipitation within the territory of the ancestral origins of an individual. Data Source: [Mitchell et al. \(2004\)](#).
- **Ruggedness:** The absolute difference in the ruggedness within the territory of the ancestral origins of an individual. Data Source: [Nunn and Puga \(2012\)](#).

A.7 Mediating Channels

- **Educational attainment:** The educational attainment of individuals aggregated to 4 categories based on the IPUMS classification (i.e. high school or below, some college, college, and more than college). Data Source: Authors' computation based on [Ruggles et al. \(2023\)](#).
- **Originality:** The ability to come up with unusual or clever ideas about a given topic or situation, or to develop creative ways to solve a problem. Data Source: [National Center for O*NET Development \(2024\)](#).
- **Flow of ideas:** The ability to come up with a number of ideas about a topic (the number of ideas is important, not their quality, correctness, or creativity). Data Source: [National Center for O*NET Development \(2024\)](#).

B Summary Statistics

Table A.1. Summary Statistics

	MEAN	SD	MEDIAN	MIN	MAX	N
<hr/> A. MAIN OUTCOME <hr/>						
Wages	62,365	56,009	48,792	0	700,546	909,934
<hr/> B. INDEPENDENT VARIABLE <hr/>						
Intrapersonal diversity	6,042	4,429	4,628	48	19,501	3,597
<hr/> C. DEMOGRAPHIC CHARACTERISTICS <hr/>						
Male	0.53	0.50	1.00	0	1.0	909,934
Age	44.13	10.57	45.00	25	64.0	909,934
<hr/> D. MEDIATING CHANNELS <hr/>						
High school completed	0.24	0.43	0.00	0	1.0	909,934
Some college	0.34	0.47	0.00	0	1.0	909,934
College completed	0.27	0.44	0.00	0	1.0	909,934
Above college	0.15	0.36	0.00	0	1.0	909,934
Originality	38.66	10.87	39.00	9	65.0	398
Flow of ideas	40.09	10.59	41.00	13	67.0	397
<hr/> E. ALTERNATIVE CULTURAL DISTANCES <hr/>						
Linguistic distance	2.10	4.06	1.00	0	15.0	3,077
Religious distance	2.30	1.99	2.00	0	5.0	3,077
Genetic distance	0.60	0.59	0.24	0	2.8	3,369
Contiguous homelands	0.06	0.24	0.00	0	1.0	3,369
<hr/> F. ABSOLUTE DIFFERENCES IN GEOGRAPHY <hr/>						
Caloric suitability (avg.)	2724.62	2358.48	2064.50	0	13098.2	3,563
Caloric suitability (s.d.)	1193.00	985.51	961.33	0	5598.1	3,563
Latitude	22.85	20.89	16.38	0	110.6	3,597
Ruggedness	1.11	0.92	0.89	0	4.7	3,510
Temperature (avg.)	8.95	7.28	7.66	0	34.0	3,563
Precipitation (avg.)	4.55	3.51	3.76	0	18.3	3,563
Temperature (s.d.)	2.35	2.02	1.75	0	9.3	3,563
Precipitation (s.d.)	1.15	0.90	0.96	0	4.9	3,563

Notes: The table provides for all variables used in the data analysis the mean, the standard deviation (SD), the median, the minimum value (MIN), the maximum value (MAX), and the number of observations (N).

C Robustness Checks and Sensitivity Analyses

C.1 Individuals Between 16 and 25 Years Old

Table C.1. Intrapersonal Diversity & Wage Income: Include Individuals Between 16 and 25 Years Old

	LOG WAGES		
	(1)	(2)	(3)
Intrapersonal diversity	0.18*** (0.062)	0.28*** (0.067)	0.24*** (0.056)
Intrapersonal diversity (squared)	-0.13*** (0.044)	-0.19*** (0.044)	-0.16*** (0.038)
Primary ancestry FE	✓	✓	✓
Secondary ancestry FE	✓	✓	✓
Age FE		✓	✓
Sex FE			✓
Dep. var. mean	59,975	59,975	59,975
Observations	974,730	974,730	974,730
Primary ancestral homelands	111	111	111
Secondary ancestral homelands	106	106	106
Adjusted R^2	0.026	0.15	0.20
Wage maximizing migratory distance (km)	6694***	7507***	7407***
Wage(ψ^*)-Wage(ψ_{min})	3395	5920	5009
Wage(ψ^*)-Wage(ψ_{max})	14238	17343	15453

Notes: This table establishes that the impact of intrapersonal diversity on wage income is unaffected qualitatively if we include individuals who are between 16 and 25 years old. All specifications account for primary and secondary ancestry as well as age and gender fixed-effects. Two-way standard errors (clustered at the primary ancestry level and at the secondary ancestry level) are reported in parentheses. ψ^* denotes the wage maximizing level of migratory distance; ψ_{min} denotes the lowest level of migratory distance in the sample; ψ_{max} denotes the highest level of migratory distance in the sample. *** Significant at the 1 percent level. ** Significant at the 5 percent level. * Significant at the 10 percent level.

C.2 Individuals Who are Not Full-Time, Year-Round Workers

Table C.2. Intrapersonal Diversity & Wage Income: Include Individuals Who are Not Full-Time, Year-Round Workers

	LOG WAGES		
	(1)	(2)	(3)
Intrapersonal diversity	0.20** (0.079)	0.26*** (0.080)	0.21*** (0.070)
Intrapersonal diversity (squared)	-0.16** (0.061)	-0.19*** (0.061)	-0.15*** (0.055)
Primary ancestry FE	✓	✓	✓
Secondary ancestry FE	✓	✓	✓
Age FE		✓	✓
Sex FE			✓
Dep. var. mean	51,668	51,668	51,668
Observations	1,303,235	1,303,235	1,303,235
Primary ancestral homelands	111	111	111
Secondary ancestral homelands	109	109	109
Adjusted R^2	0.0076	0.018	0.035
Wage maximizing migratory distance (km)	6592***	7033***	6781***
Wage(ψ^*)-Wage(ψ_{min})	7784	10523	7834
Wage(ψ^*)-Wage(ψ_{max})	27582	30442	25628

Notes: This table establishes that the impact of intrapersonal diversity on wage income is unaffected qualitatively if we include individuals who are not full-time, year-round workers. All specifications account for primary and secondary ancestry as well as age and gender fixed-effects. Two-way standard errors (clustered at the primary ancestry level and at the secondary ancestry level) are reported in parentheses. ψ^* denotes the wage maximizing level of migratory distance; ψ_{min} denotes the lowest level of migratory distance in the sample; ψ_{max} denotes the highest level of migratory distance in the sample. *** Significant at the 1 percent level. ** Significant at the 5 percent level. * Significant at the 10 percent level.

C.3 Individuals Who Report Single Ancestry

Table C.3. Intrapersonal Diversity & Wage Income: Include Individuals Who Report Single Ancestry

	LOG WAGES		
	(1)	(2)	(3)
Intrapersonal diversity	0.14*** (0.045)	0.21*** (0.046)	0.28*** (0.043)
Intrapersonal diversity (squared)	-0.15*** (0.026)	-0.20*** (0.028)	-0.25*** (0.027)
Primary ancestry FE	✓	✓	✓
Secondary ancestry FE	✓	✓	✓
Age FE		✓	✓
Sex FE			✓
Dep. var. mean	61,538	61,538	61,538
Observations	2,140,102	2,140,102	2,140,102
Primary ancestral homelands	113	113	113
Secondary ancestral homelands	113	113	113
Adjusted R^2	0.035	0.070	0.12
Wage maximizing migratory distance (km)	4774***	5297***	5712***
Wage(ψ^*)-Wage(ψ_{min})	2053	3291	4840
Wage(ψ^*)-Wage(ψ_{max})	16971	20096	23423

Notes: This table establishes that the impact of intrapersonal diversity on wage income is unaffected qualitatively if we include individuals who report a single ancestry and assign them zero intrapersonal diversity. All specifications account for primary and secondary ancestry as well as age and gender fixed-effects. Two-way standard errors (clustered at the primary ancestry level and at the secondary ancestry level) are reported in parentheses. ψ^* denotes the wage maximizing level of migratory distance; ψ_{min} denotes the lowest level of migratory distance in the sample; ψ_{max} denotes the highest level of migratory distance in the sample. *** Significant at the 1 percent level. ** Significant at the 5 percent level. * Significant at the 10 percent level.

C.4 Ancestry Pair as Symmetric

Table C.4. Intrapersonal Diversity & Wage Income: Considering the Ancestry Pair as Symmetric

	LOG WAGES		
	(1)	(2)	(3)
Intrapersonal diversity	0.23*** (0.054)	0.29*** (0.058)	0.24*** (0.051)
Intrapersonal diversity (squared)	-0.15*** (0.037)	-0.18*** (0.039)	-0.15*** (0.035)
Ancestry i FE	✓	✓	✓
Ancestry j FE	✓	✓	✓
Age FE		✓	✓
Sex FE			✓
Dep. var. mean	62,365	62,365	62,365
Observations	909,924	909,924	909,924
Primary ancestral homelands	110	110	110
Secondary ancestral homelands	110	110	110
Adjusted R^2	0.026	0.065	0.12
Wage maximizing migratory distance (km)	7745***	7985***	7904***
Wage(ψ^*)-Wage(ψ_{min})	5361	6966	5652
Wage(ψ^*)-Wage(ψ_{max})	11812	13793	11669

Notes: This table establishes that the impact of intrapersonal diversity on wage income is unaffected qualitatively if we consider the ancestry pair as symmetric. All specifications account for primary and secondary ancestry as well as age and gender fixed-effects. Two-way standard errors (clustered at the primary ancestry level and at the secondary ancestry level) are reported in parentheses. ψ^* denotes the wage maximizing level of migratory distance; ψ_{min} denotes the lowest level of migratory distance in the sample; ψ_{max} denotes the highest level of migratory distance in the sample. *** Significant at the 1 percent level. ** Significant at the 5 percent level. * Significant at the 10 percent level.

C.5 Unconditional Analysis

Table C.5. Intrapersonal Diversity & Wage Income: Unconditional Analysis

	LOG WAGES			
	(1)	(2)	(3)	(4)
Intrapersonal diversity	0.46*** (0.16)	0.34** (0.14)	0.38** (0.19)	0.25*** (0.067)
Intrapersonal diversity (squared)	-0.46*** (0.11)	-0.37*** (0.097)	-0.40*** (0.13)	-0.17*** (0.046)
Primary ancestry FE		✓		✓
Secondary ancestry FE			✓	✓
Dep. var. mean	62,365	62,365	62,365	62,365
Observations	909,934	909,931	909,929	909,926
Primary ancestral homelands	112	109	112	109
Secondary ancestral homelands	111	111	106	106
Adjusted R^2	0.015	0.021	0.020	0.026
Wage maximizing migratory distance (km)	4951***	4694**	4712**	7284***
Wage(ψ^*)-Wage(ψ_{min})	6932	4889	5413	5597
Wage(ψ^*)-Wage(ψ_{max})	41115	35511	37842	14693

Notes: This table establishes that the impact of intrapersonal diversity on wage income is unaffected qualitatively when not accounting for either the primary and secondary ancestry fixed-effects, or both. All specifications account for primary and secondary ancestry as well as age and gender fixed-effects. Two-way standard errors (clustered at the primary ancestry level and at the secondary ancestry level) are reported in parentheses. ψ^* denotes the wage maximizing level of migratory distance; ψ_{min} denotes the lowest level of migratory distance in the sample; ψ_{max} denotes the highest level of migratory distance in the sample. *** Significant at the 1 percent level. ** Significant at the 5 percent level. * Significant at the 10 percent level.

C.6 Men vs. Women

Table C.6. Intrapersonal Diversity & Wage Income: Men vs. Women

	LOG WAGES					
	MEN			WOMEN		
	(1)	(2)	(3)	(4)	(5)	(6)
Intrapersonal diversity	0.24*** (0.065)	0.32*** (0.068)	0.32*** (0.068)	0.19*** (0.055)	0.22*** (0.055)	0.22*** (0.055)
Intrapersonal diversity (squared)	-0.17*** (0.046)	-0.22*** (0.046)	-0.22*** (0.046)	-0.12*** (0.039)	-0.14*** (0.039)	-0.14*** (0.039)
Primary ancestry FE	✓	✓	✓	✓	✓	✓
Secondary ancestry FE	✓	✓	✓	✓	✓	✓
Age FE		✓	✓		✓	✓
Sex FE			✓			✓
Dep. var. mean	72,781	72,781	72,781	50,616	50,616	50,616
Observations	482,320	482,320	482,320	427,592	427,592	427,592
Primary ancestral homelands	107	107	107	100	100	100
Secondary ancestral homelands	102	102	102	100	100	100
Adjusted R^2	0.026	0.089	0.089	0.027	0.049	0.049
Wage maximizing migratory distance (km)	6743***	7335***	7335***	7658***	7757***	7757***
Wage(ψ^*)-Wage(ψ_{min})	5541	8078	8078	3631	4275	4275
Wage(ψ^*)-Wage(ψ_{max})	18208	20387	20387	8362	9390	9390

Notes: This table establishes that the impact of intrapersonal diversity on wage income is similar in a sample that consists of only men (Columns (1)-(3)), or only women (Columns (4)-(6)). All specifications account for primary and secondary ancestry as well as age and gender fixed-effects. Two-way standard errors (clustered at the primary ancestry level and at the secondary ancestry level) are reported in parentheses. ψ^* denotes the wage maximizing level of migratory distance; ψ_{min} denotes the lowest level of migratory distance in the sample; ψ_{max} denotes the highest level of migratory distance in the sample. *** Significant at the 1 percent level. ** Significant at the 5 percent level. * Significant at the 10 percent level.

C.7 Effect per Decade

Table C.7. Intrapersonal Diversity & Wage Income: Effect per Decade

	LOG WAGES				
	1980	1990	2000	2010	2020
	(1)	(2)	(3)	(4)	(5)
Intrapersonal diversity	0.15*** (0.037)	0.28*** (0.070)	0.25*** (0.056)	0.27*** (0.059)	0.17*** (0.044)
Intrapersonal diversity (squared)	-0.11*** (0.030)	-0.20*** (0.052)	-0.16*** (0.042)	-0.18*** (0.042)	-0.12*** (0.032)
Dep. var. mean	18,018	31,004	45,920	62,365	79,774
Observations	572,551	784,126	716,630	909,926	894,604
Primary ancestral homelands	97	90	94	109	120
Secondary ancestral homelands	91	96	97	106	125
Adjusted R^2	0.13	0.11	0.11	0.12	0.11
Wage maximizing migratory distance (km)	6800***	7202***	7704***	7436***	7214***
Wage(ψ^*)-Wage(ψ_{min})	995	3398	4431	5917	4493
Wage(ψ^*)-Wage(ψ_{max})	3413	7361	7817	14570	12791

Notes: This table reports the impact of intrapersonal diversity on wage income at each decade over the period 1980-2020. All specifications account for primary and secondary ancestry as well as age and gender fixed-effects. Two-way standard errors (clustered at the primary ancestry level and at the secondary ancestry level) are reported in parentheses. ψ^* denotes the wage maximizing level of migratory distance; ψ_{min} denotes the lowest level of migratory distance in the sample; ψ_{max} denotes the highest level of migratory distance in the sample. *** Significant at the 1 percent level. ** Significant at the 5 percent level. * Significant at the 10 percent level.

C.8 Horse-Race With Geographical Distances

Table C.8. Intrapersonal Diversity & Wage Income: Horse-Race With Geographical Distances

	LOG WAGES								
	(1)	(2)	(3)	(4)	(5)	(6)	(7)	(8)	(9)
Intrapersonal diversity	0.27*** (0.059)		0.23*** (0.067)		0.22*** (0.057)		0.22*** (0.055)		0.24*** (0.055)
Intrapersonal diversity (squared)	-0.18*** (0.042)		-0.16*** (0.047)		-0.15*** (0.039)		-0.15*** (0.041)		-0.17*** (0.040)
Absolute difference in latitude		0.0018*** (0.00037)	0.00058* (0.00033)						
Absolute difference in caloric suitability (avg.)				0.0054*** (0.0019)	0.0025 (0.0018)				
Absolute difference in caloric suitability (s.d.)				0.0046 (0.0035)	0.0046 (0.0036)				
Absolute difference in temperature (avg.)						0.0024*** (0.00066)	0.00070 (0.00093)		
Absolute difference in precipitation (avg.)						0.0041*** (0.0014)	0.0020** (0.00086)		
Absolute difference in temperature (s.d.)						-0.00072 (0.0013)	-0.00031 (0.0015)		
Absolute difference in precipitation (s.d.)						0.0047*** (0.00066)	0.0020 (0.0015)		
Absolute difference in ruggedness								0.017*** (0.0044)	0.011*** (0.0035)
Dep. var. mean	62,347	62,347	62,347	62,347	62,347	62,347	62,347	62,347	62,347
Observations	907,289	907,289	907,289	907,289	907,289	907,289	907,289	907,289	907,289
Primary ancestral homelands	107	107	107	107	107	107	107	107	107
Secondary ancestral homelands	104	104	104	104	104	104	104	104	104
Adjusted R^2	0.12	0.12	0.12	0.12	0.12	0.12	0.12	0.12	0.12
Wage maximizing migratory distance (km)	7428***		7296***		7318***		7094***		7313***
Wage(ψ^*)-Wage(ψ_{min})	5870		5051		4838		4551		5289
Wage(ψ^*)-Wage(ψ_{max})	14505		13283		12652		13053		13768

Notes: This table reports the impact of intrapersonal diversity on wage income, accounting for differences in geographical characteristics between ancestral origins of individuals. All specifications account for primary and secondary ancestry as well as age and gender fixed-effects. Two-way standard errors (clustered at the primary ancestry level and at the secondary ancestry level) are reported in parentheses. ψ^* denotes the wage maximizing level of migratory distance; ψ_{min} denotes the lowest level of migratory distance in the sample; ψ_{max} denotes the highest level of migratory distance in the sample. *** Significant at the 1 percent level. ** Significant at the 5 percent level. * Significant at the 10 percent level.

C.9 Within Educational and Occupational Categories

Table C.9. Intrapersonal Diversity & Wage Income: Within Educational and Occupational Categories

	LOG WAGES			
	(1)	(2)	(3)	(4)
Intrapersonal diversity	0.27*** (0.059)	0.15*** (0.027)	0.17*** (0.033)	0.14*** (0.023)
Intrapersonal diversity (squared)	-0.18*** (0.042)	-0.10*** (0.020)	-0.12*** (0.025)	-0.098*** (0.019)
Primary ancestry FE	✓	✓	✓	✓
Secondary ancestry FE	✓	✓	✓	✓
Age FE	✓	✓	✓	✓
Sex FE	✓	✓	✓	✓
Education FE		✓		✓
Occupation FE			✓	✓
Dep. var. mean	62,365	62,365	62,365	62,365
Observations	909,926	909,926	909,926	909,926
Primary ancestral homelands	109	109	109	109
Secondary ancestral homelands	106	106	106	106
Adjusted R^2	0.12	0.28	0.40	0.44
Wage maximizing migratory distance (km)	7436***	7439***	7017***	6983***
Wage(ψ^*)-Wage(ψ_{min})	5917	3278	3384	2622
Wage(ψ^*)-Wage(ψ_{max})	14570	8333	10175	8108

Notes: This table reports the impact of intrapersonal diversity on wage income, accounting for either the educational attainment or the occupation of individuals, or both. All specifications account for primary and secondary ancestry as well as age and gender fixed-effects. Two-way standard errors (clustered at the primary ancestry level and at the secondary ancestry level) are reported in parentheses. ψ^* denotes the wage maximizing level of migratory distance; ψ_{min} denotes the lowest level of migratory distance in the sample; ψ_{max} denotes the highest level of migratory distance in the sample. *** Significant at the 1 percent level. ** Significant at the 5 percent level. * Significant at the 10 percent level.