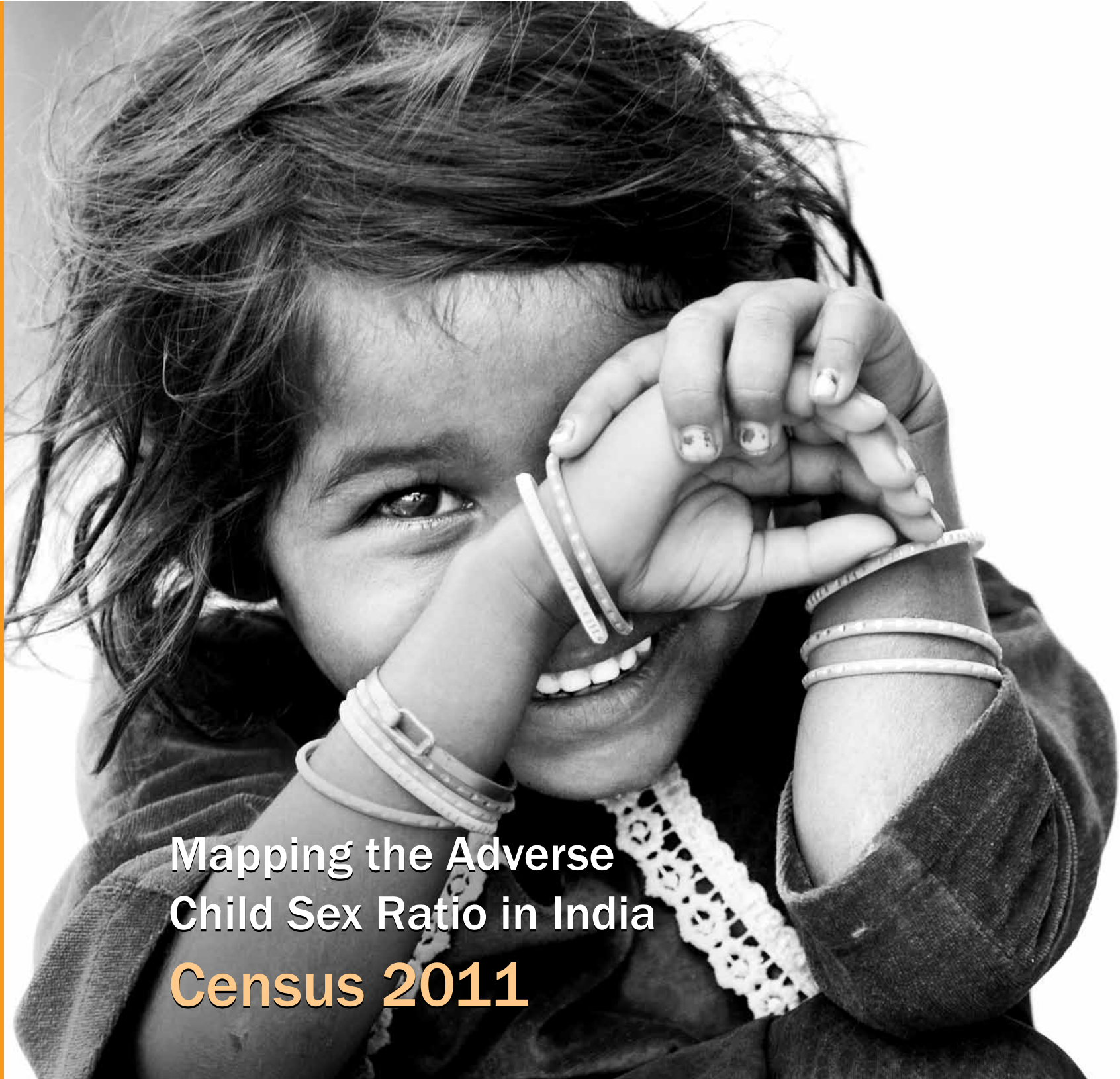


missing...



Mapping the Adverse
Child Sex Ratio in India
Census 2011

Based on the 2011 census, this publication captures the changes in Child Sex Ratio over two decades and offers a snapshot of the changing demographic realities of India. In continuation of 'MISSING... Mapping the Adverse Child Sex Ratio in India', 2003, this is the second publication in the series.



It has long been observed that as a natural phenomenon, more boys are born than girls. As a result, the normal sex ratio at birth (SRB), calculated as the number of girls born for every 1000 boys born, is usually in the range 943-962. Over time, with higher male mortality, this imbalance is expected to even out for higher age groups. However, early discriminatory behaviour such as gender-biased sex selection before birth or neglect of girls after birth artificially skews SRB as well as child sex ratio (CSR), measured as the number of girls per 1000 boys in the age group 0-6, in favour of boys. Given this context, the CSR remains much below the normal or desirable range of 950 or more girls per 1000 boys.

The CSR in India has declined from 927 girls per 1000 boys in 2001 to 918 according to Census 2011. Wide variations are seen in ratios across different regions of the country. Overall, the CSR remains adverse in 21 states and Union Territories, the fall ranging from 3 to 79 points. On the other hand, 11 states and two union territories have registered an increase in CSR during the last decade. Changes in CSR at the district level are more pronounced. Of the total 640 districts in the country, 429 districts have experienced decline in CSR. Of this, 26 districts recorded drastic decline (of 50 points or more), and 52 districts reported sharp decline (of 30-49 points). An overwhelming number of districts also experienced moderate (of 10-29 points) or marginal (less than 10 points) decline in CSR. Census 2011 also points to the spread of this phenomenon from largely urban and prosperous areas to rural, remote and tribal pockets of the country.

Gender biased sex selection is a discriminatory practice that is a result of a complex web of factors: deep-seated patriarchal mindsets that lead families to value sons over daughters, the need for small families, but with sons, and commercialisation and misuse of medical technology that enables illegal sex selection.

Sex ratio imbalances are expected to have serious socio-demographic consequences, further reinforcing the subordination of girls and women. The issue therefore requires a multi-faceted response to enhance the value of girls, as well as legal measures to curb misuse of medical technology.

This publication maps the trends in CSR over the decade between 2001 and 2011. It tracks the shifts in urban and rural ratios from 1991-2011, and highlights both the degree and patterns of change at the district level, across India.

Contents

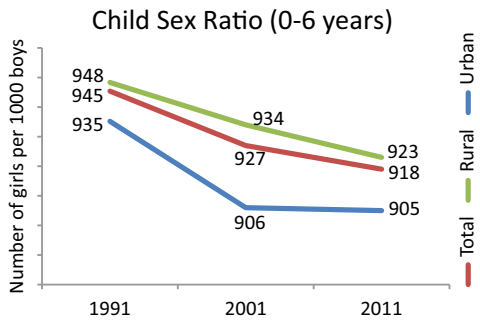
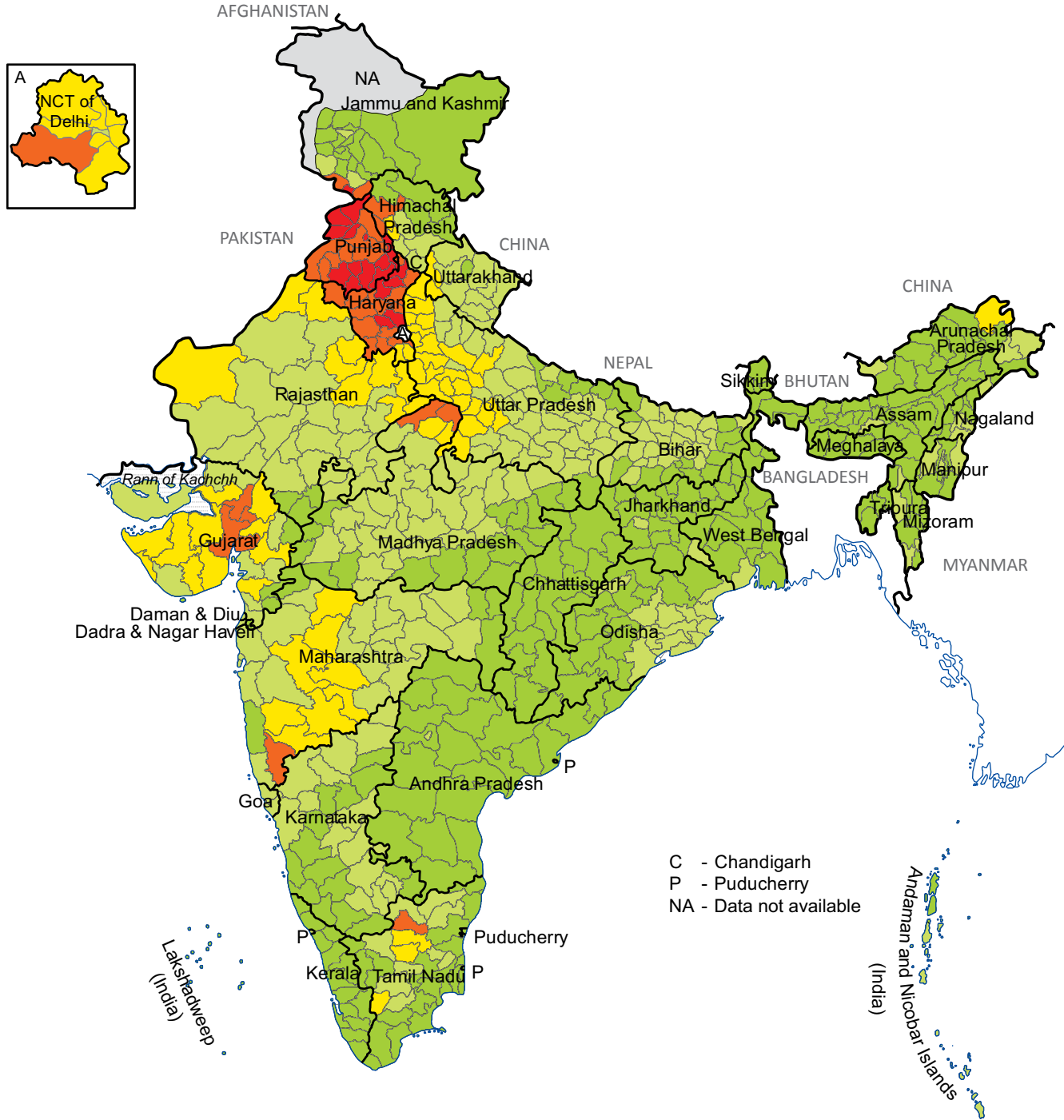
India	4
Situation in Tribal Areas	6
Degree of Decline in CSR 2001 to 2011	8
Unpacking Discrimination – Analysis of Implied SRB trends	9
Jammu & Kashmir	10
Himachal Pradesh	12
Punjab	14
Uttarakhand	16
Haryana	18
NCT of Delhi	20
Rajasthan	22
Uttar Pradesh	24
Bihar	26
Sikkim	28
Arunachal Pradesh	30
Nagaland	32
Manipur	34
Mizoram	36

Tripura	38
Meghalaya	40
Assam	42
West Bengal	44
Jharkhand	46
Odisha	48
Chhattisgarh	50
Madhya Pradesh	52
Gujarat	54
Maharashtra	56
Andhra Pradesh	58
Karnataka	60
Goa	62
Kerala	64
Tamil Nadu	66
Union Territories	68
Law Prohibits Gender Biased Sex Selection	70

Contents

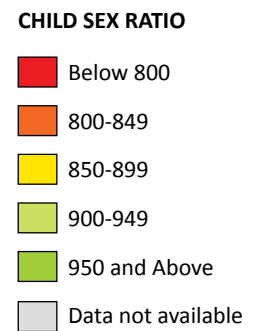
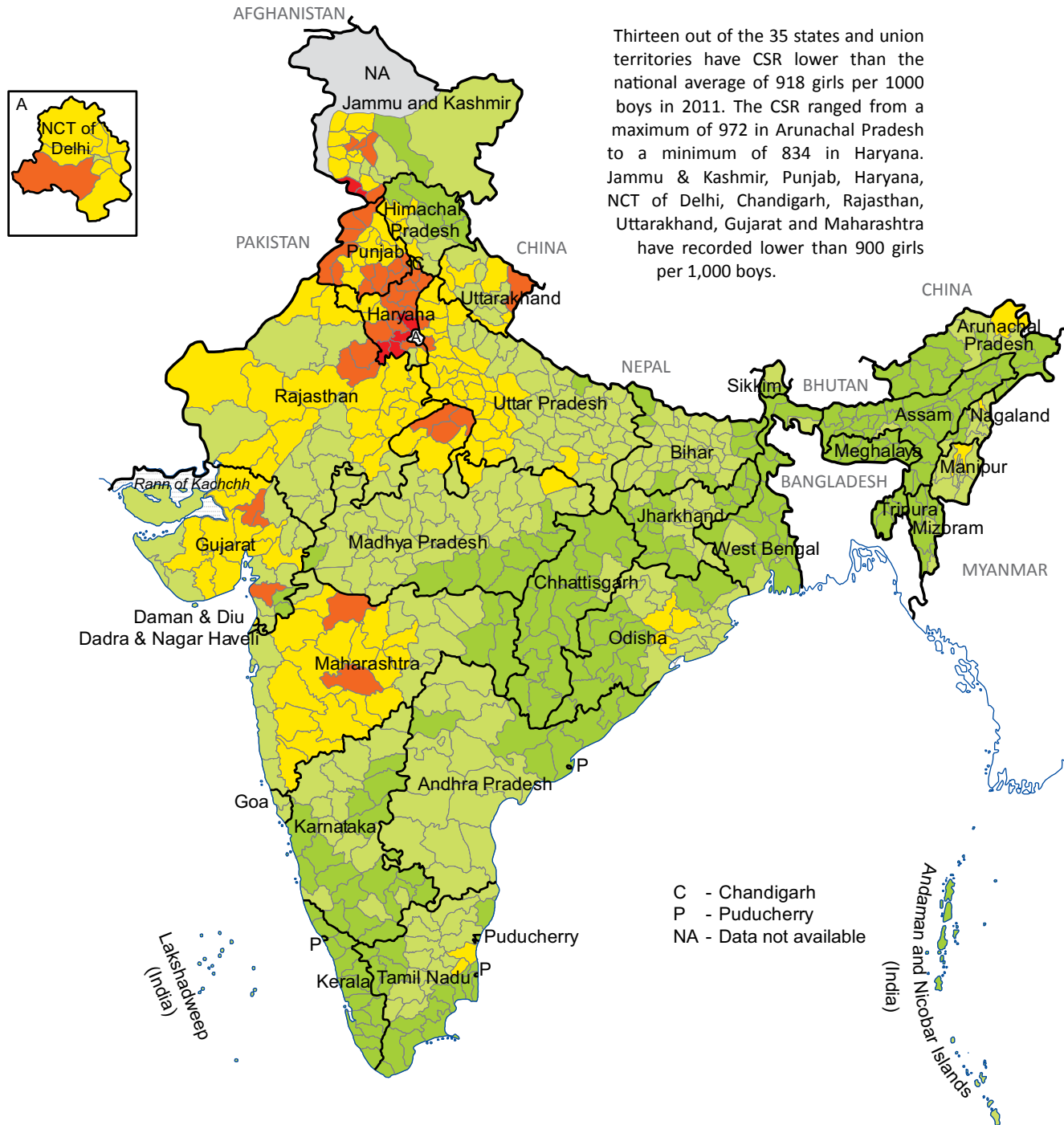
India

CSR 927 2001



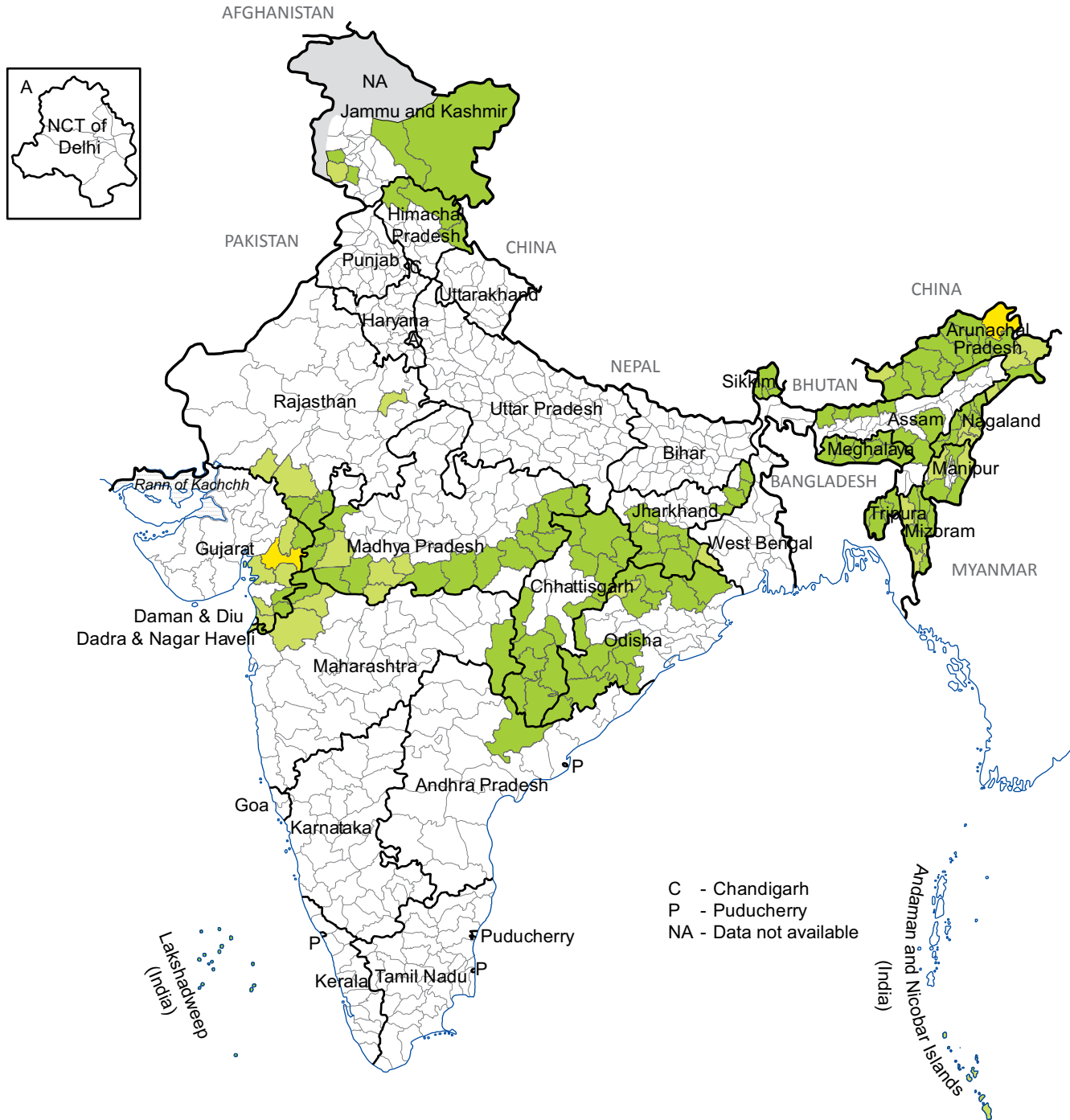
India 2011

CSR 918



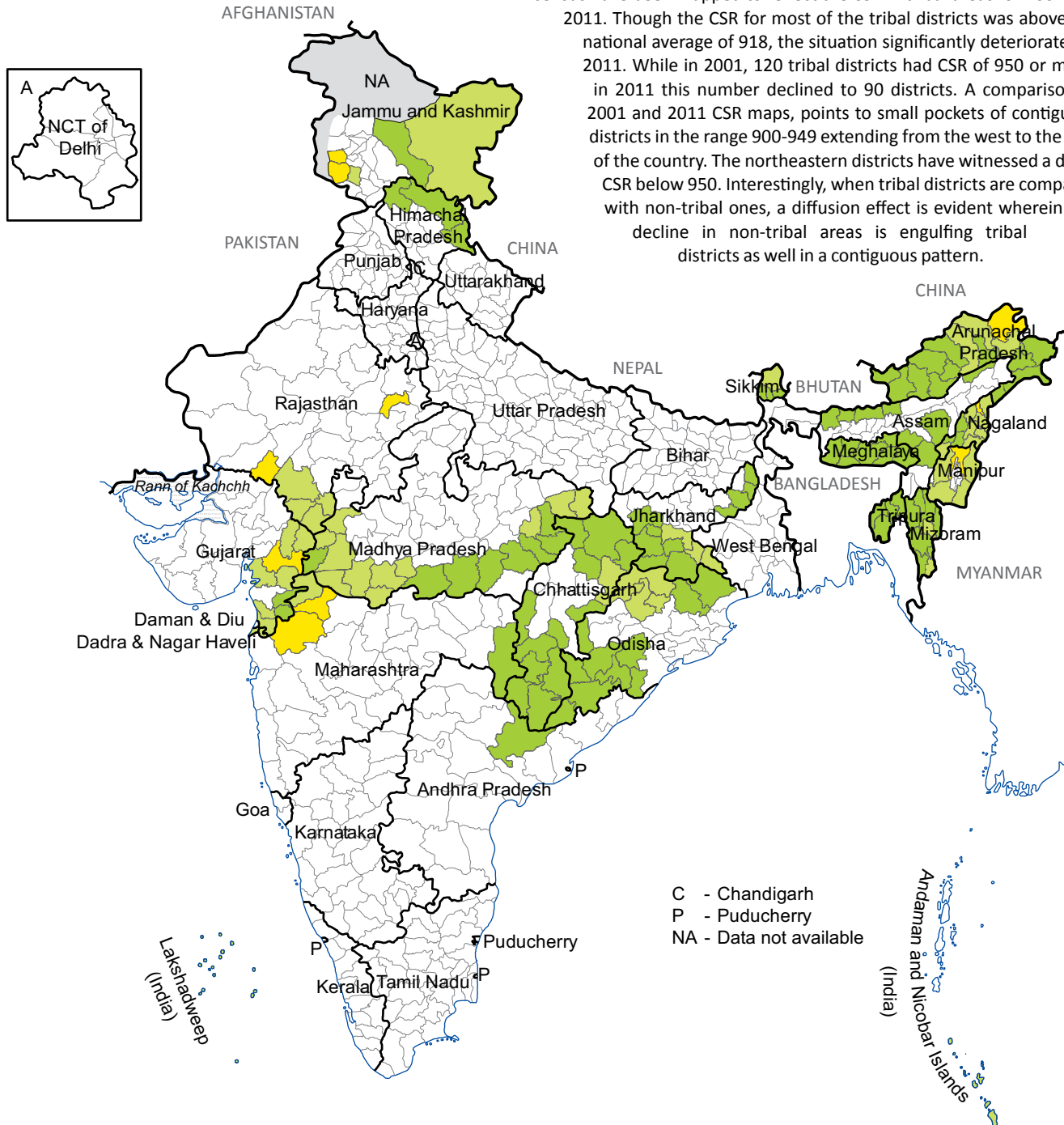
Situation in Tribal Areas

2001



Situation in Tribal Areas 2011

All 152 districts with more than 25 percent tribal population according to 2011 census have been mapped to reflect the CSR in tribal areas for 2001 and 2011. Though the CSR for most of the tribal districts was above the national average of 918, the situation significantly deteriorated in 2011. While in 2001, 120 tribal districts had CSR of 950 or more, in 2011 this number declined to 90 districts. A comparison of 2001 and 2011 CSR maps, points to small pockets of contiguous districts in the range 900-949 extending from the west to the east of the country. The northeastern districts have witnessed a dip in CSR below 950. Interestingly, when tribal districts are compared with non-tribal ones, a diffusion effect is evident wherein CSR decline in non-tribal areas is engulfing tribal districts as well in a contiguous pattern.

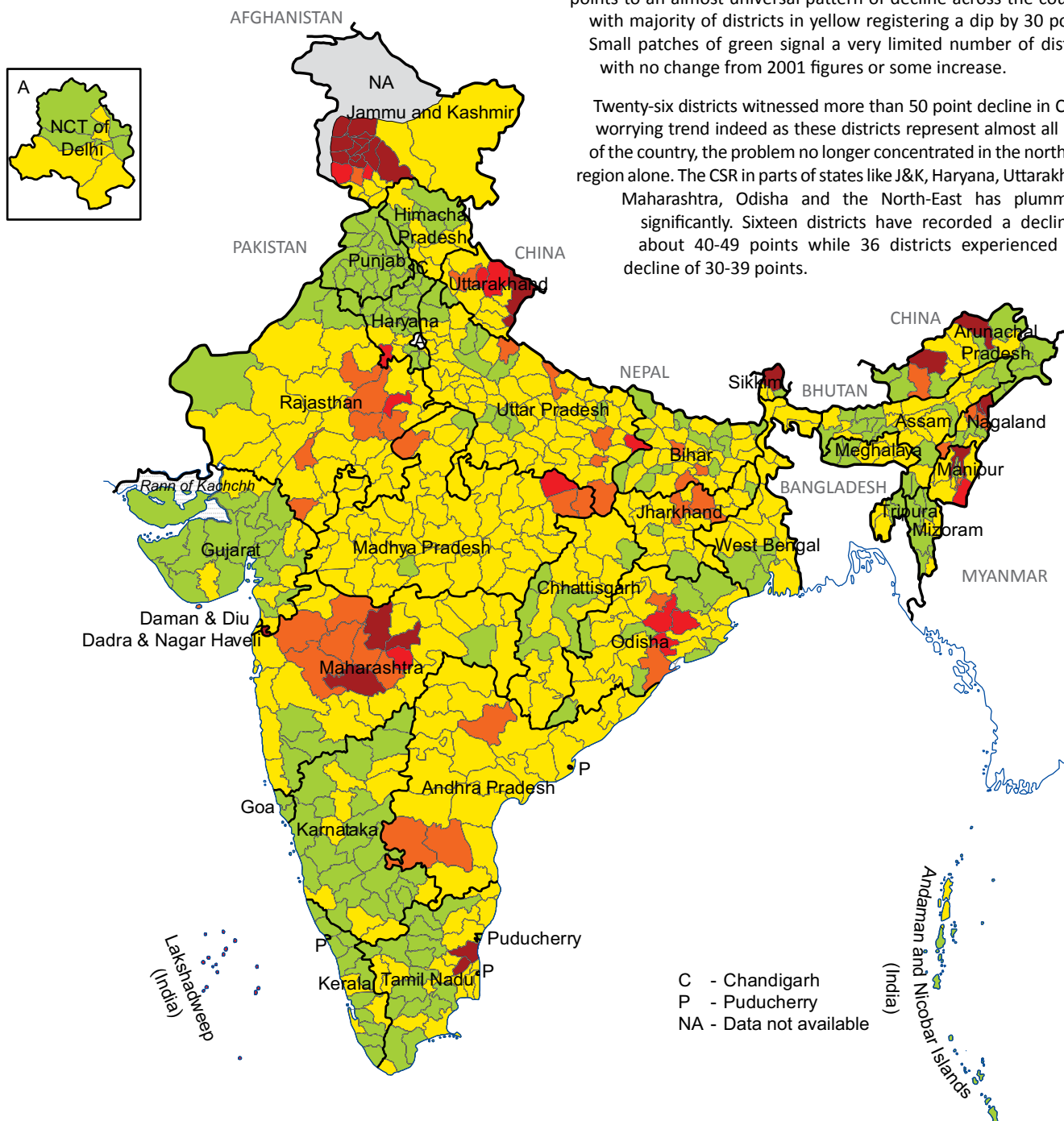


Degree of Decline in CSR

2001 - 2011

District-level variations in CSR are enormous in 2011 and so is the severity of decline in some districts as compared to 2001 CSR figures. The map points to an almost universal pattern of decline across the country, with majority of districts in yellow registering a dip by 30 points. Small patches of green signal a very limited number of districts with no change from 2001 figures or some increase.

Twenty-six districts witnessed more than 50 point decline in CSR, a worrying trend indeed as these districts represent almost all parts of the country, the problem no longer concentrated in the northwest region alone. The CSR in parts of states like J&K, Haryana, Uttarakhand, Maharashtra, Odisha and the North-East has plummeted significantly. Sixteen districts have recorded a decline of about 40-49 points while 36 districts experienced a decline of 30-39 points.



DECLINE IN CHILD SEX RATIO

- 50 points and Above
- 40-49
- 30-39
- Below 30
- No Change/Increase
- Data not available

As compared to CSR, the sex ratio at birth (SRB) is a more robust indicator of the extent of the practice of gender biased sex selection. Unlike CSR which is affected by factors such as post-birth mortality, selective neglect of girls, etc, the SRB provides data of the number of girls born for every 1000 boys born. This analysis has been undertaken to provide a sense of SRB estimates based on the successive censuses. As the estimate has been derived indirectly through a demographic technique of 'reverse survival' using the 0-6 age group, the relevant SRB has been termed as 'Implied Sex Ratio at Birth'.

The implied SRB (ISRB) for India in 2011 is estimated to be 923 girls born for every 1000 boys born and has declined from 935 in 2001. Half of the states in the country barring J&K have witnessed decline in their ISRB and the range of decline varied between -33 and -3 points with Uttarakhand exhibiting maximum decline and Tamil Nadu recording minimum decline.

On the other hand, 14 states have shown an increase. The range of maximum increase has come from states like Punjab, Mizoram and Himachal Pradesh that have almost caught up with the national average. If the normal range of 943-962 ISRB is applied, then 13 out of 29 states fall within this range*. Those below this range include states such as Delhi, Gujarat, Haryana, Jammu & Kashmir, Rajasthan, Punjab and Uttarakhand where the ISRB is less than 900.

District-level estimates of ISRB (*not shown in the table*) indicate substantial variation across the country from the lowest of 775 to the highest of 1,033. About a quarter of the districts in India (161) are characterized by very low ISRB (lower than 900). Along with the low ISRB, these districts are also characterised by low CSR, pointing to both pre- and post-birth discrimination, as seen in districts like Jhajjar (782), Mahendragarh (775) and Rewari (787) in Haryana and Samba (779) in Jammu & Kashmir.

State-wise Trends in Implied Sex Ratio at Birth Derived from 2001 and 2011 Censuses

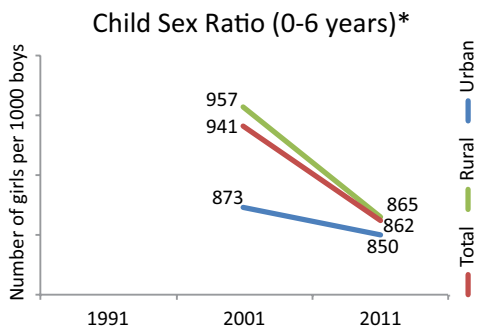
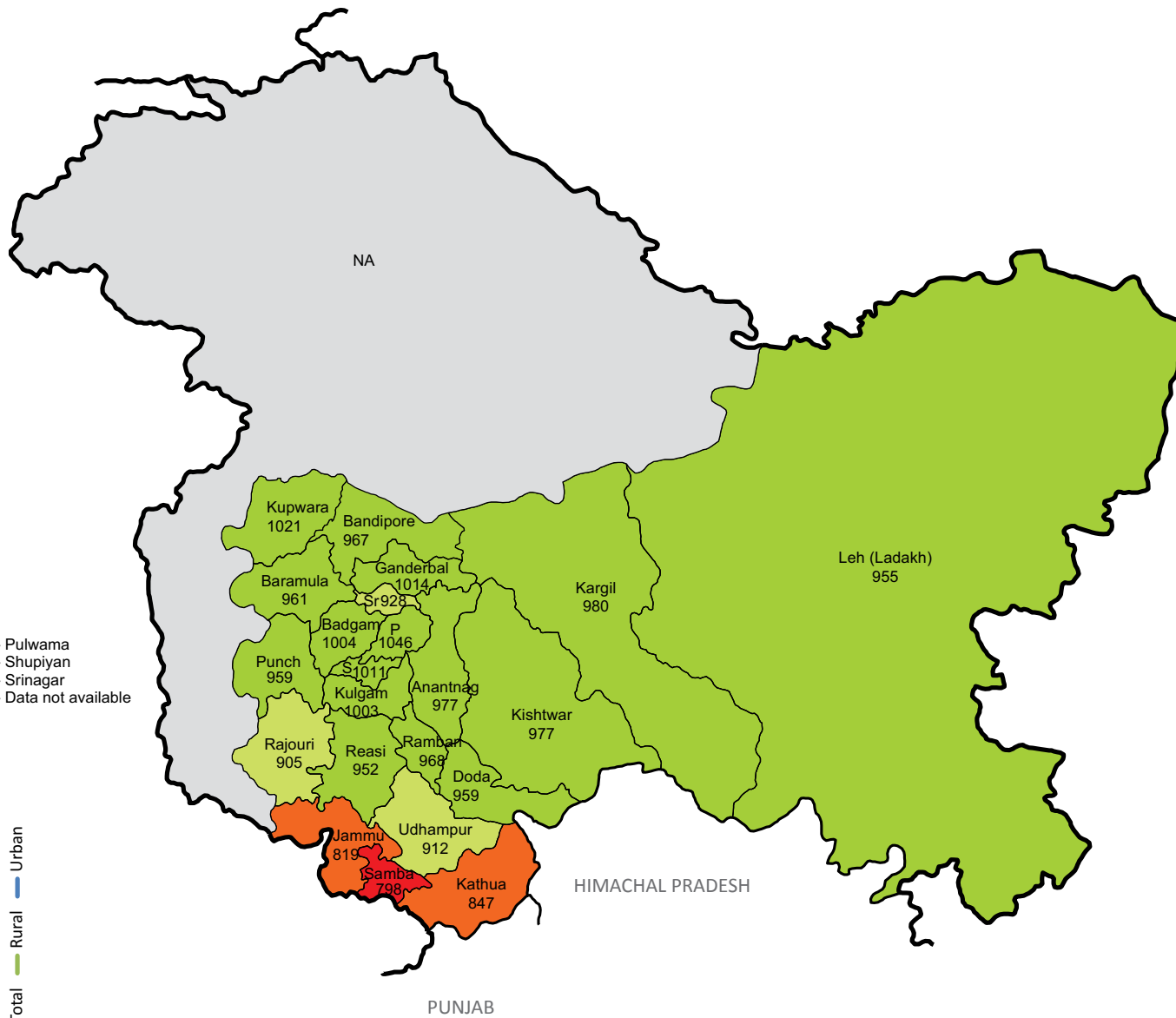
S. No.	India and States	Implied Sex Ratio at Birth (ISRB)		Change in ISRB over 1994-2000 to 2004-10
		1994-2000	2004-10	
	INDIA	935	923	-12
Large States				
1	Andhra Pradesh	959	938	-21
2	Assam	968	961	-7
3	Bihar	954	943	-11
4	Chhattisgarh	983	971	-12
5	Delhi	865	873	8
6	Gujarat	890	895	5
7	Haryana	838	845	6
8	Himachal Pradesh	898	916	19
9	Jammu & Kashmir	NA	866	-
10	Jharkhand	977	958	-19
11	Karnataka	944	949	5
12	Kerala	959	965	5
13	Madhya Pradesh	941	923	-18
14	Maharashtra	915	896	-19
15	Odisha	951	942	-9
16	Punjab	809	854	44
17	Rajasthan	924	897	-27
18	Tamil Nadu	945	942	-3
19	Uttar Pradesh	936	914	-22
20	West Bengal	953	954	1
Small States				
1	Arunachal Pradesh	965	972	7
2	Goa	931	943	12
3	Manipur	957	937	-21
4	Meghalaya	960	967	8
5	Mizoram	949	970	21
6	Nagaland	NA	944	-
7	Sikkim	948	960	12
8	Tripura	964	958	-6
9	Uttarakhand	928	895	-33

Source: Kumar, Sanjay and Sathyanarayana, K.M. *Decadal Trends in District-Level Estimates of Implied Sex Ratio at Birth in India*. Demography India, Vol. 41, No:1, 2012, published in 2014.

* Globally, sex ratios are calculated as the number of males for every 100 females. Sex Ratio at Birth is thus measured as the number of boys born for every 100 girls born. The international equivalent of a normal SRB lies in the range 104-106 boys born for every 100 girls born.

Jammu & Kashmir

CSR 941 2001

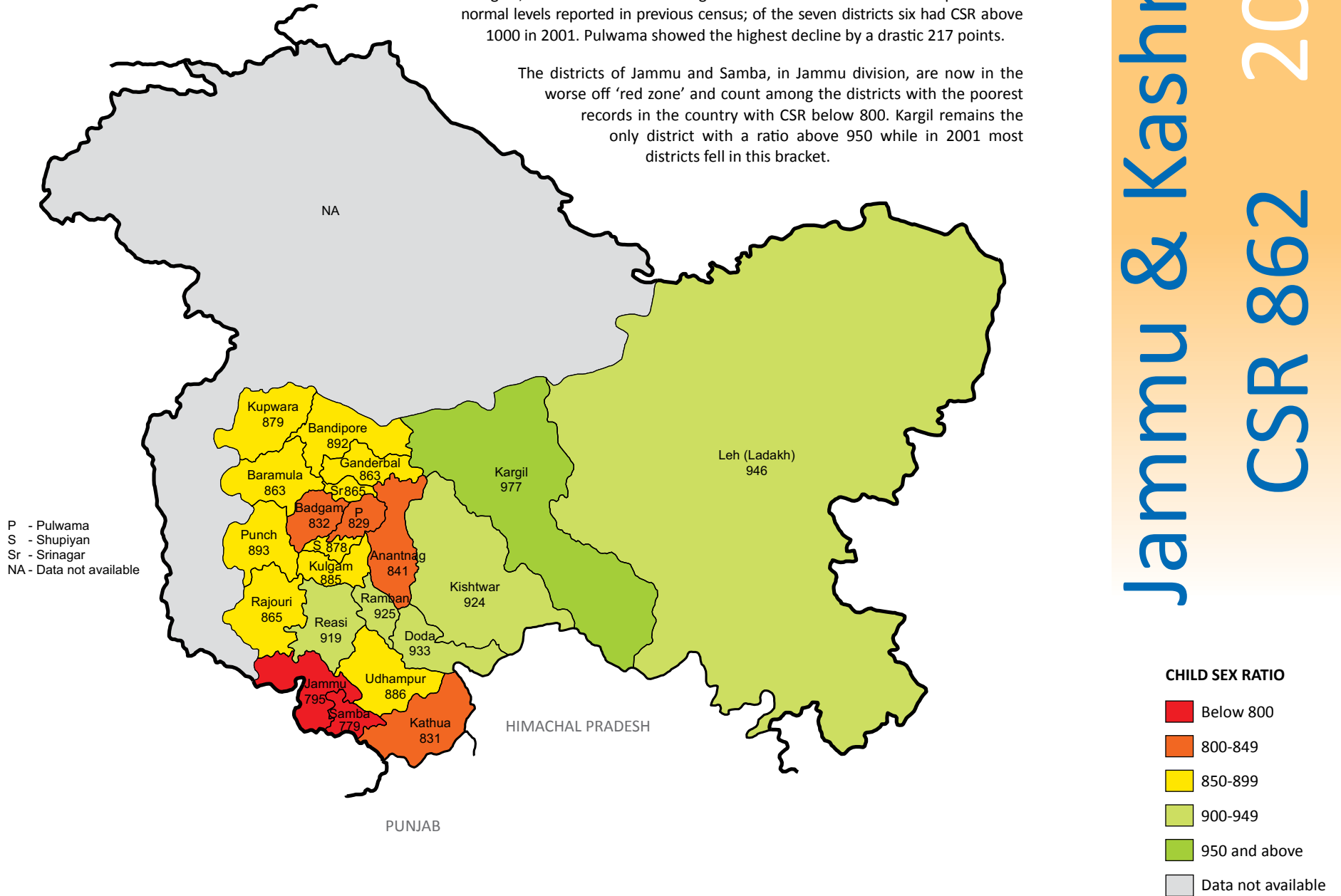


*The 1991 Census was not held in Jammu & Kashmir.

J&K recorded the highest decline in CSR in the country. The CSR fell by 79 points from 941 girls per 1000 boys in 2001 to 862 in 2011. Contrary to trends in other states, the decline in rural areas was steeper than in urban areas by a drastic 92 points, reaching 865.

In 2011, seven districts of Kupwara, Badgam, Ganderbal, Pulwama, Shupiyan, Anantnag and Kulgam, in the Kashmir division registered a decline of more than 100 points from normal levels reported in previous census; of the seven districts six had CSR above 1000 in 2001. Pulwama showed the highest decline by a drastic 217 points.

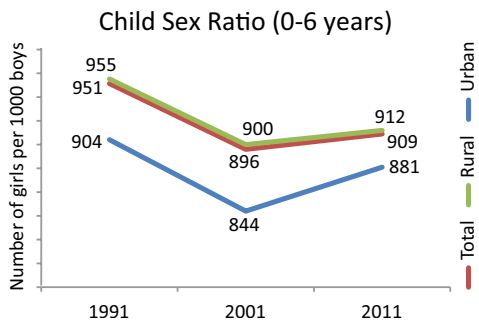
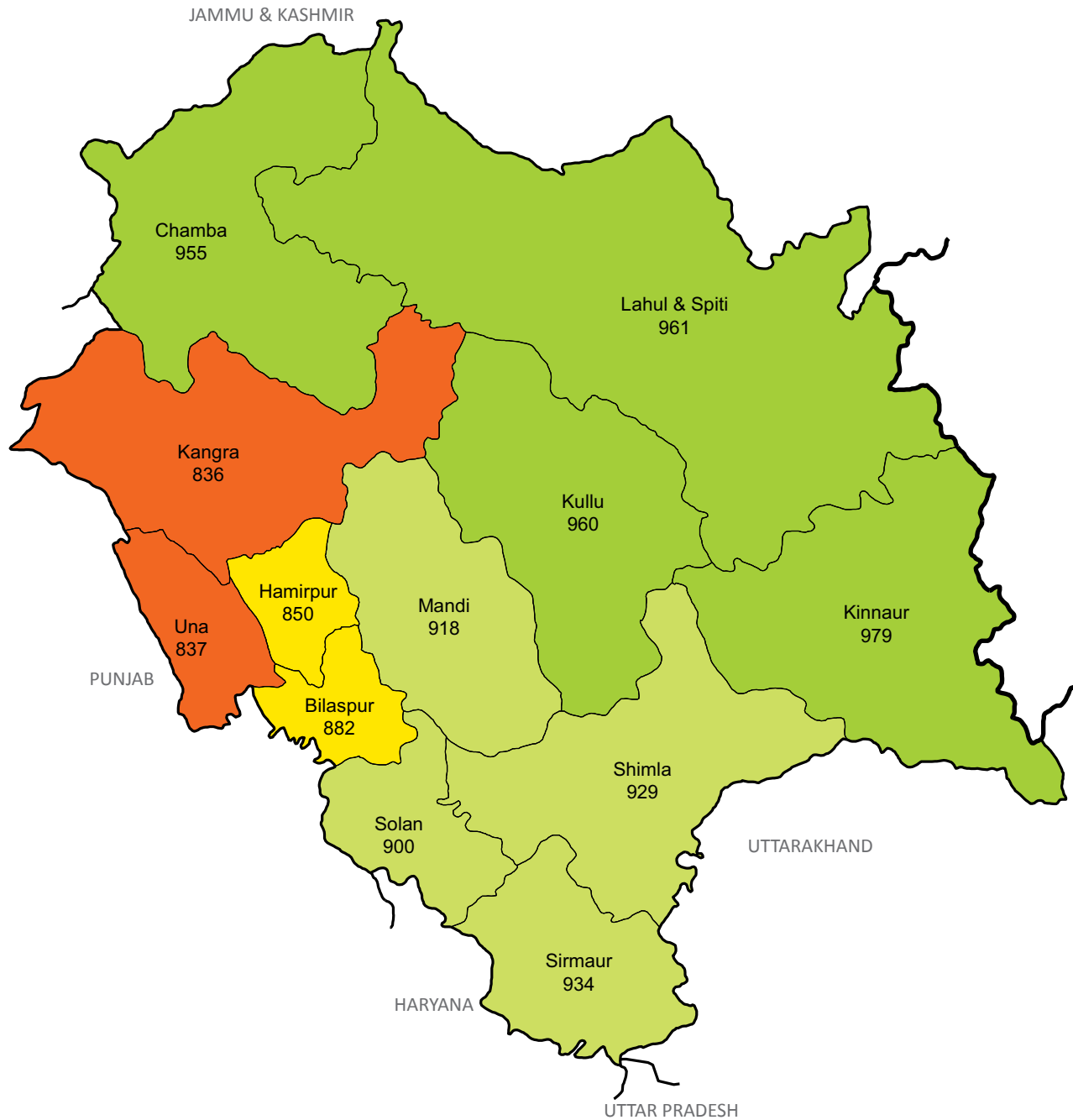
The districts of Jammu and Samba, in Jammu division, are now in the worse off 'red zone' and count among the districts with the poorest records in the country with CSR below 800. Kargil remains the only district with a ratio above 950 while in 2001 most districts fell in this bracket.



Jammu & Kashmir CSR 862 2011

Himachal Pradesh

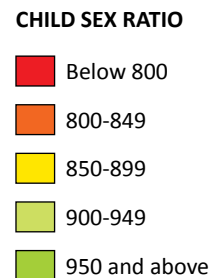
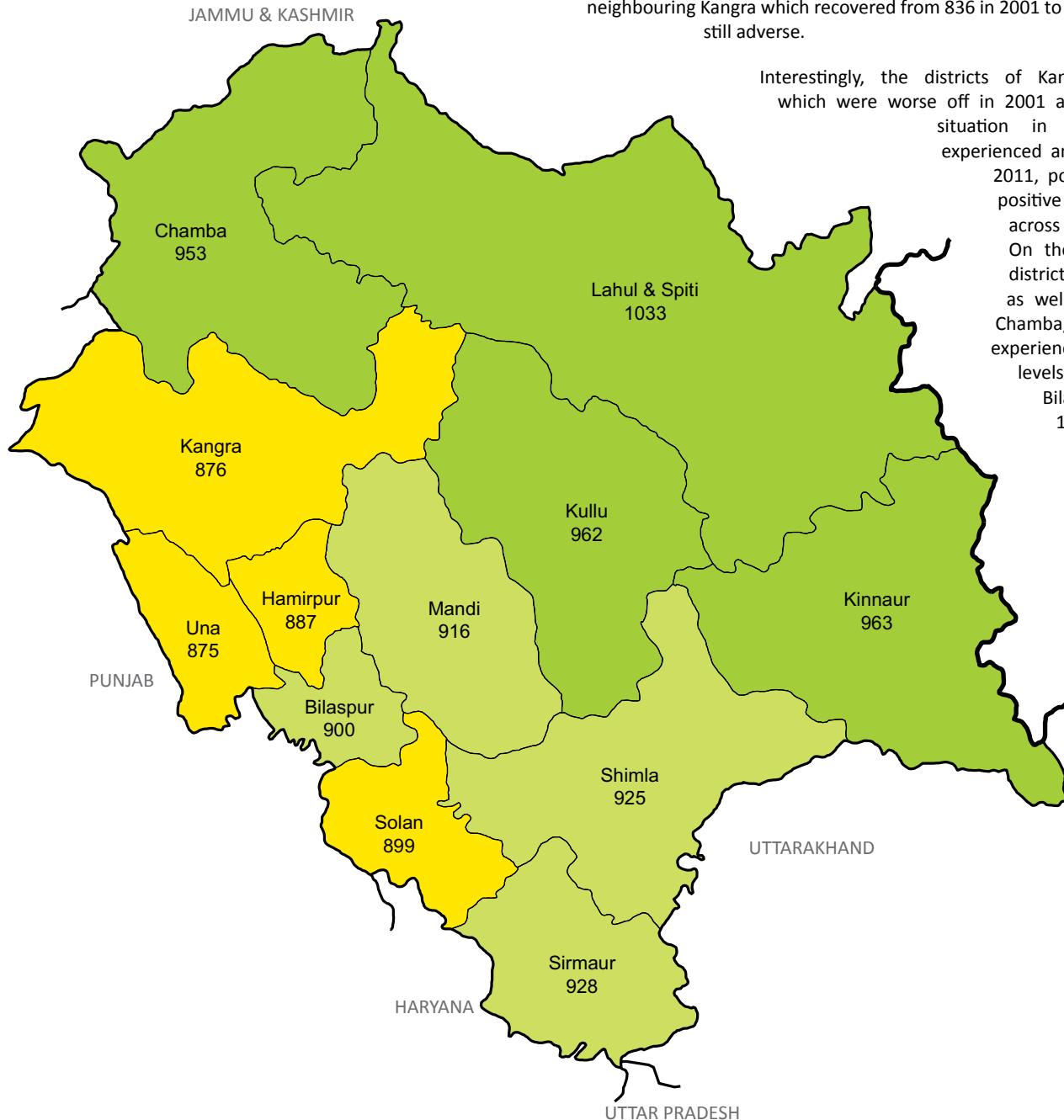
CSR 896 2001



Himachal Pradesh CSR 909 2011

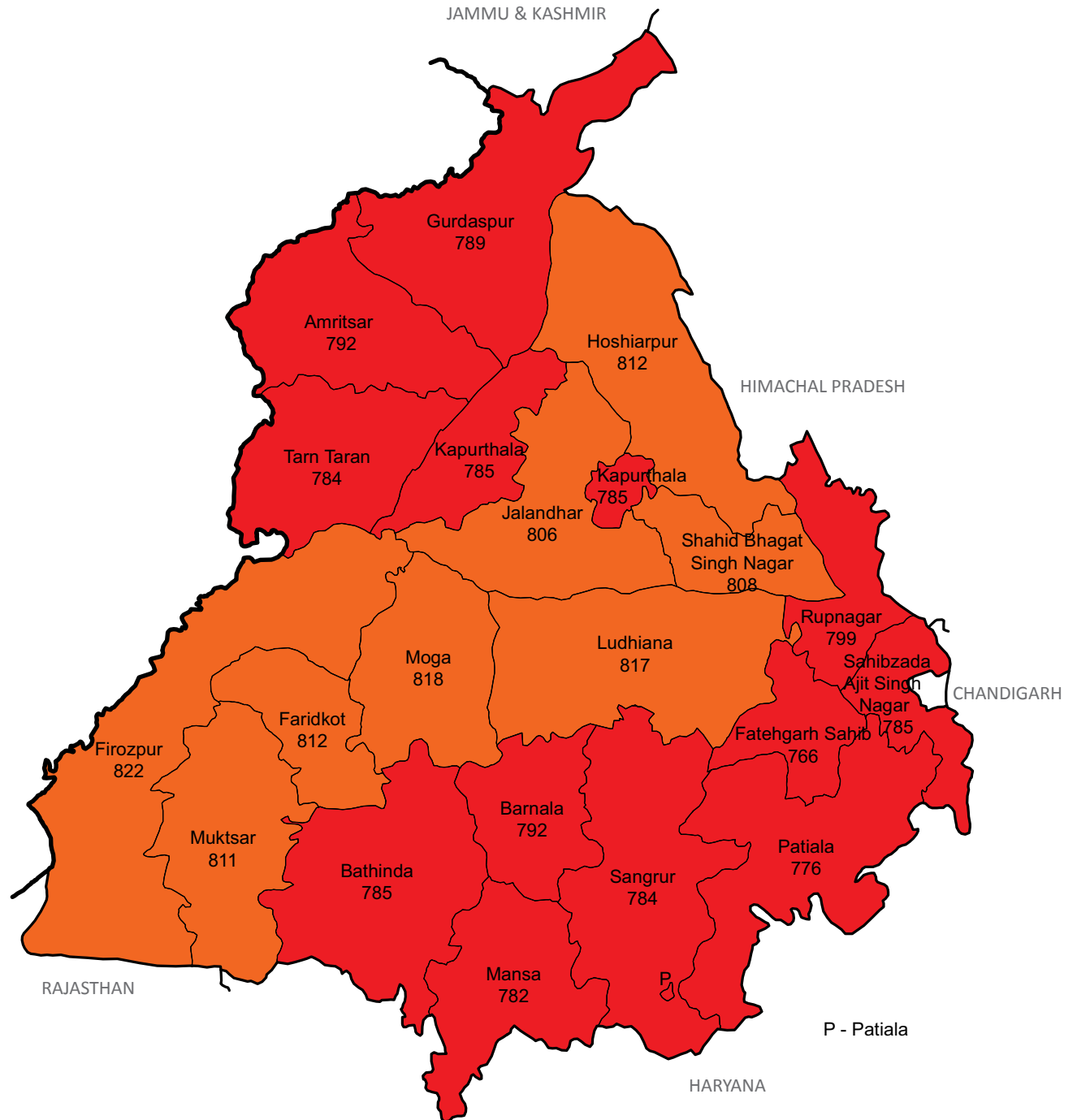
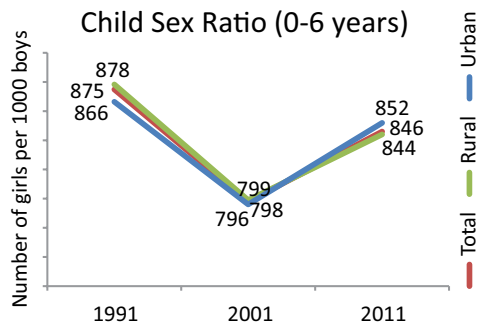
In 1991 Himachal Pradesh recorded a 'desirable' CSR of more than 950 girls to 1000 boys. In 2001, this dropped drastically by 55 points to 896. A moderate 13 point increase was registered in 2011 taking the CSR to 909. The increase was seen across both rural and urban areas. Lahul and Spiti recorded the best CSR in the country with 1033 girls to 1000 boys, unlike neighbouring Kangra which recovered from 836 in 2001 to a CSR of 876, though still adverse.

Interestingly, the districts of Kangra, Una, Bilaspur which were worse off in 2001 almost mirroring the situation in bordering Punjab, experienced an increase in CSR in 2011, pointing to perhaps a positive effect of diffusion across borders as well. On the other hand, new districts along the border as well as inland such as Chamba, Sirmaur and Kinnaur experienced a decline in CSR levels. While the ratio in Bilaspur increased by 18 points reaching 900, its neighbour Solan registered a dip below 900. CSR in Shimla further fell from 929 in 2001 to 925 in 2011.



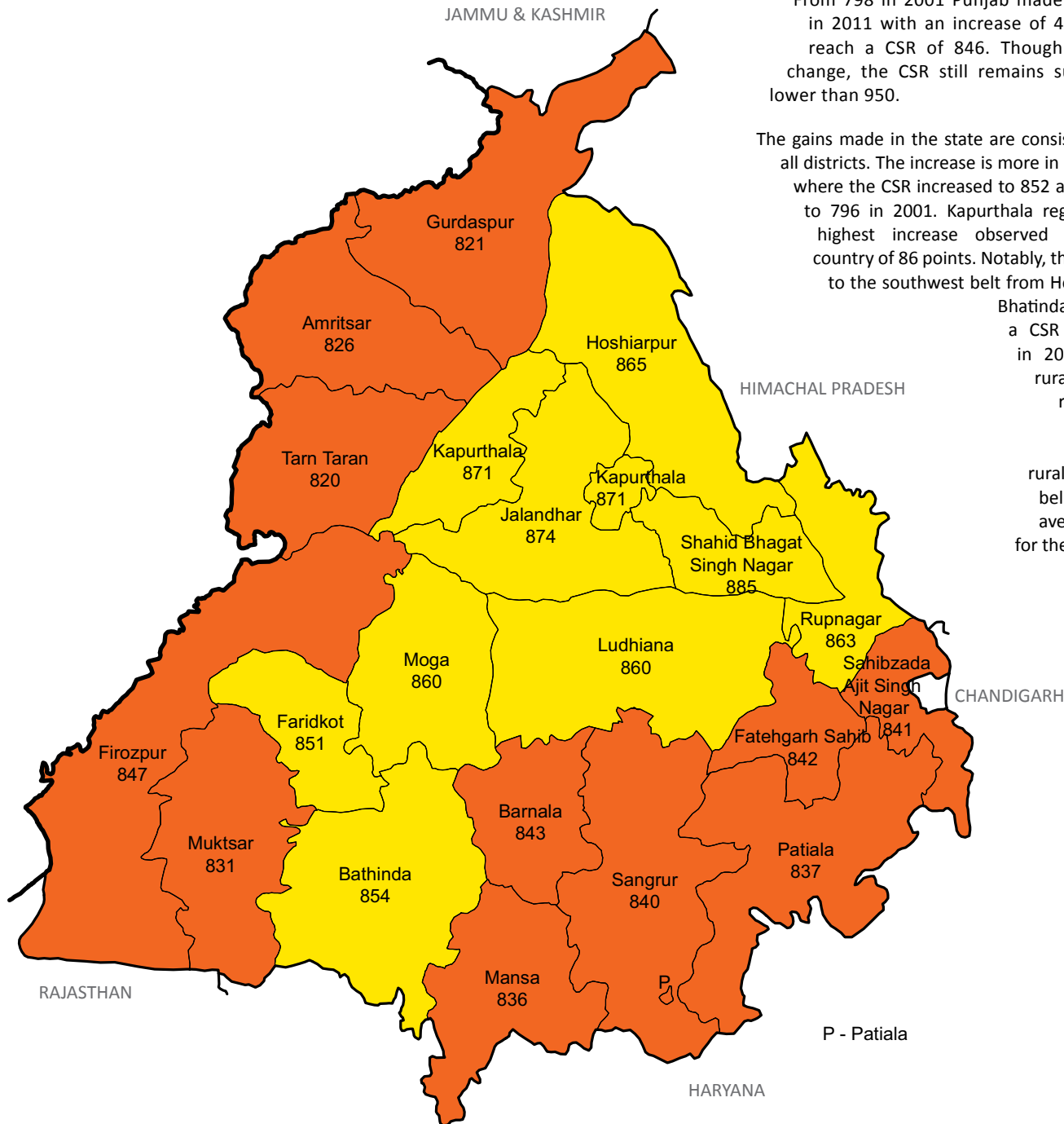
Punjab

CSR 798 2001



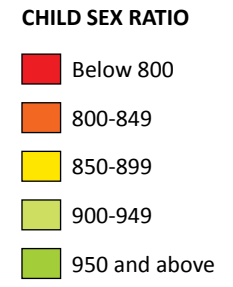
Punjab 2011

CSR 846



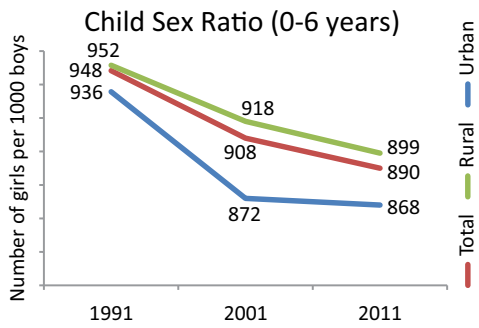
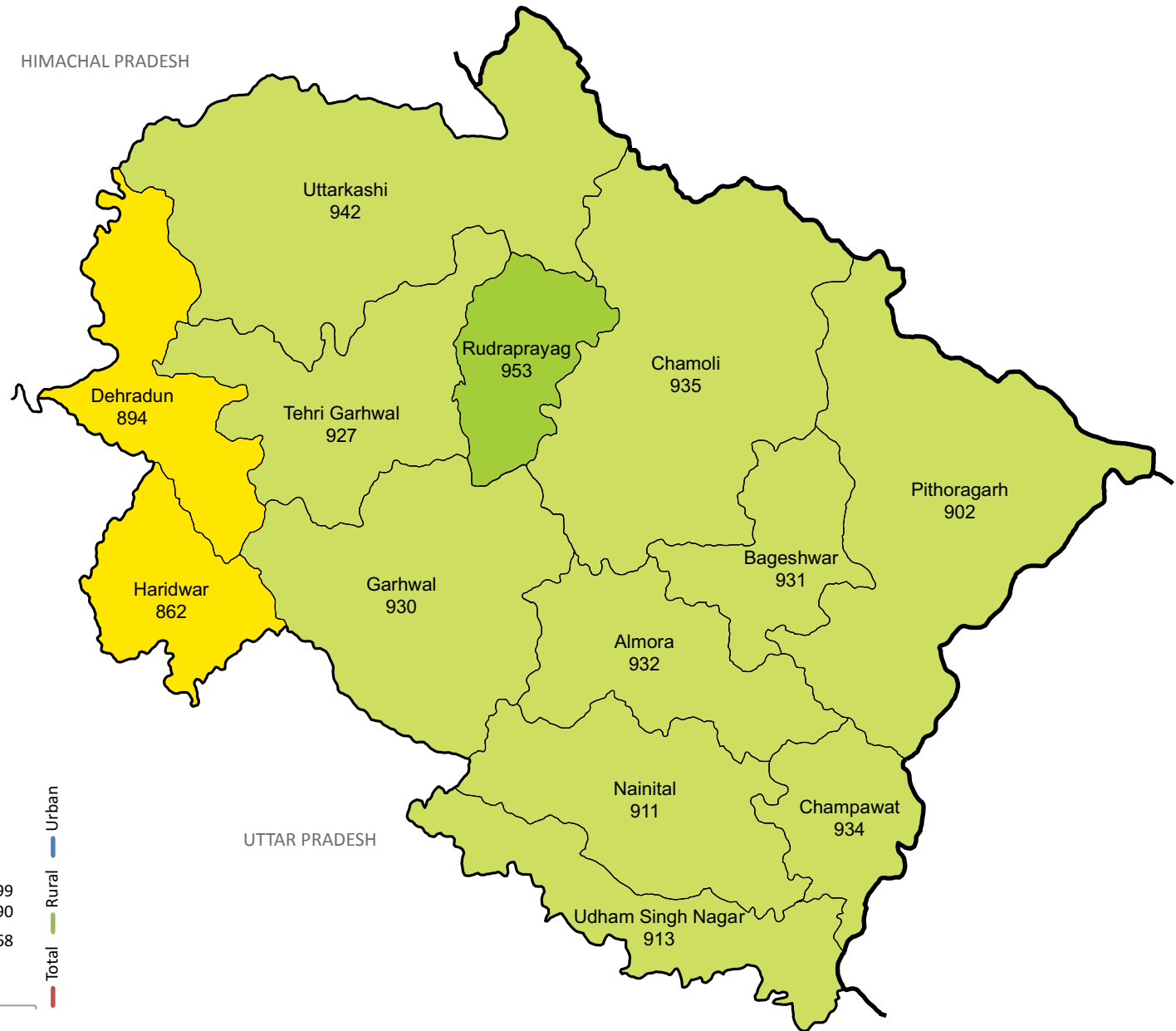
From 798 in 2001 Punjab made a recovery in 2011 with an increase of 48 points to reach a CSR of 846. Though a positive change, the CSR still remains substantially lower than 950.

The gains made in the state are consistent across all districts. The increase is more in urban areas where the CSR increased to 852 as compared to 796 in 2001. Kapurthala registered the highest increase observed across the country of 86 points. Notably, the northeast to the southwest belt from Hoshiarpur to Bhatinda, registered a CSR above 850 in 2011. Though rural areas also recorded an increase, the overall rural CSR dipped below the state average of 846 for the first time.



Uttarakhand

CSR 908 2001



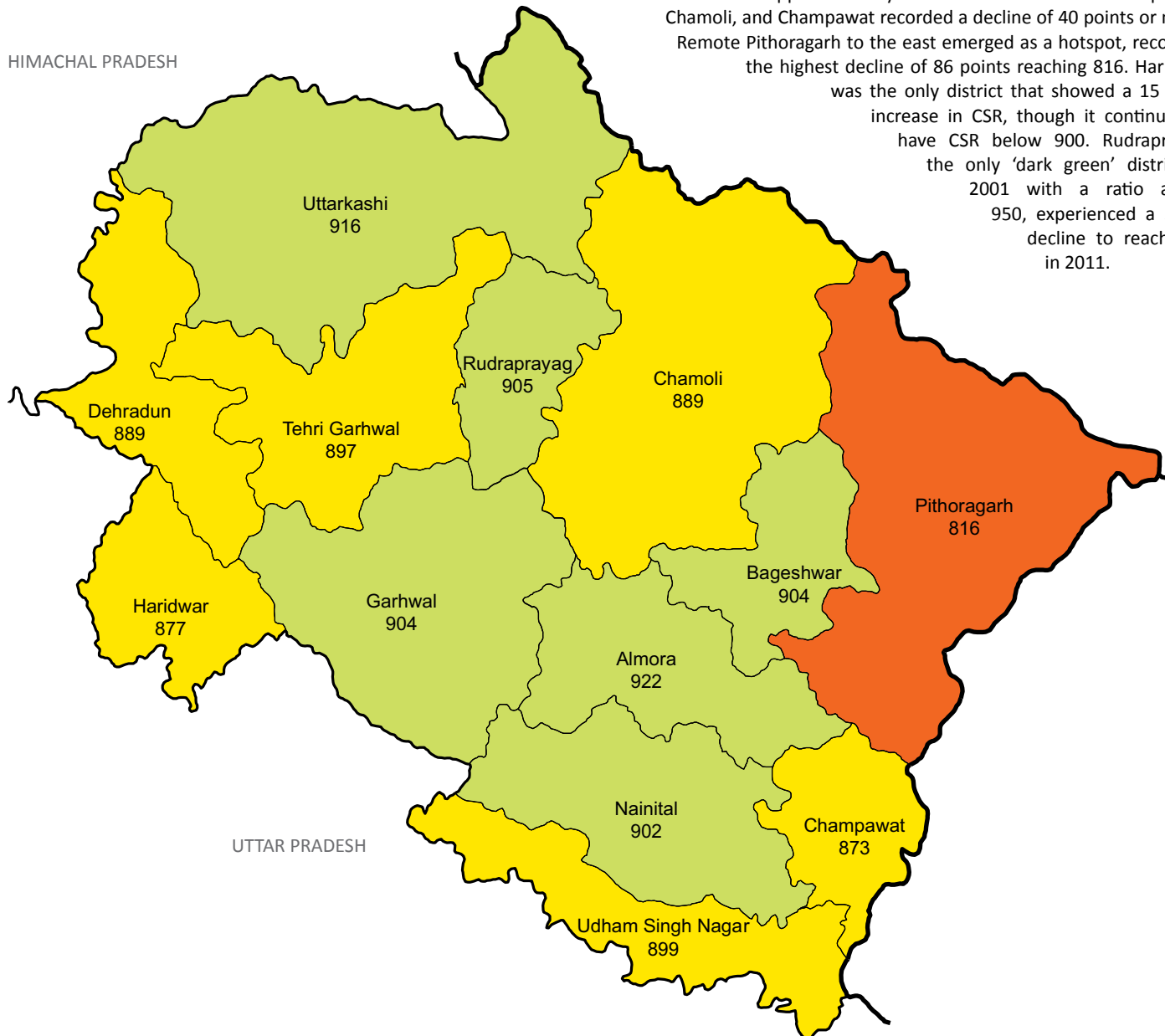
Uttarakhand CSR 890 2011

The CSR in Uttarakhand declined from 908 girls per 1000 boys in 2001 to 890 in 2011. While both rural and urban areas recorded a decline, rural CSR for the first time plummeted to below 900.

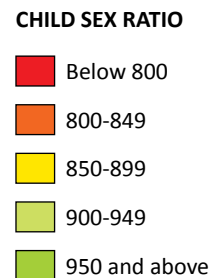
In 2011 CSR dipped in nearly all districts. Districts like Rudraprayag, Chamoli, and Champawat recorded a decline of 40 points or more.

Remote Pithoragarh to the east emerged as a hotspot, recording the highest decline of 86 points reaching 816. Haridwar was the only district that showed a 15 point increase in CSR, though it continues to have CSR below 900. Rudraprayag, the only 'dark green' district in 2001 with a ratio above 950, experienced a sharp decline to reach 905 in 2011.

HIMACHAL PRADESH

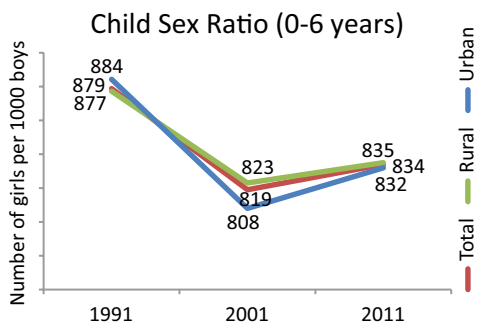
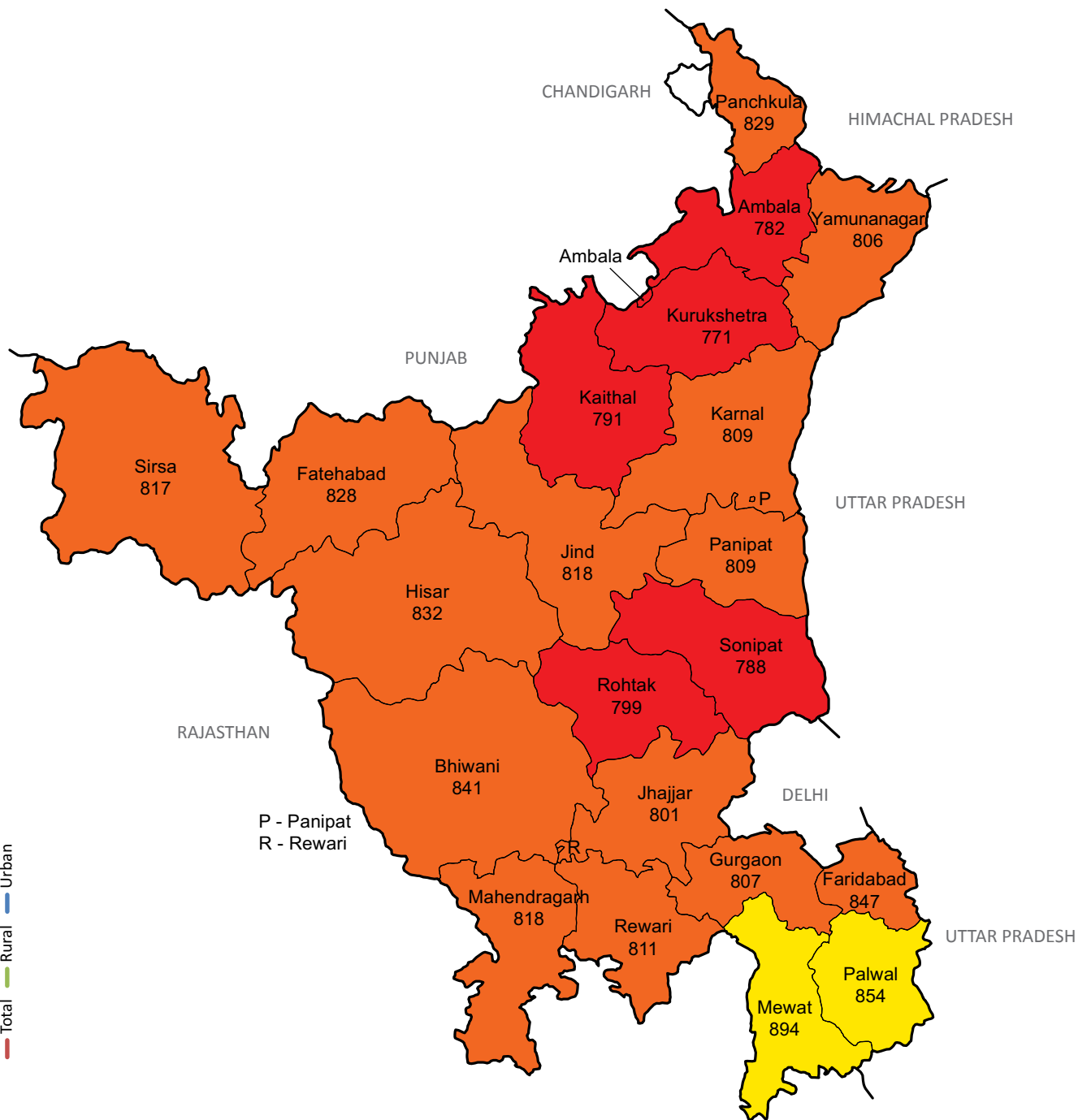


UTTAR PRADESH



Haryana

CSR 819 2001



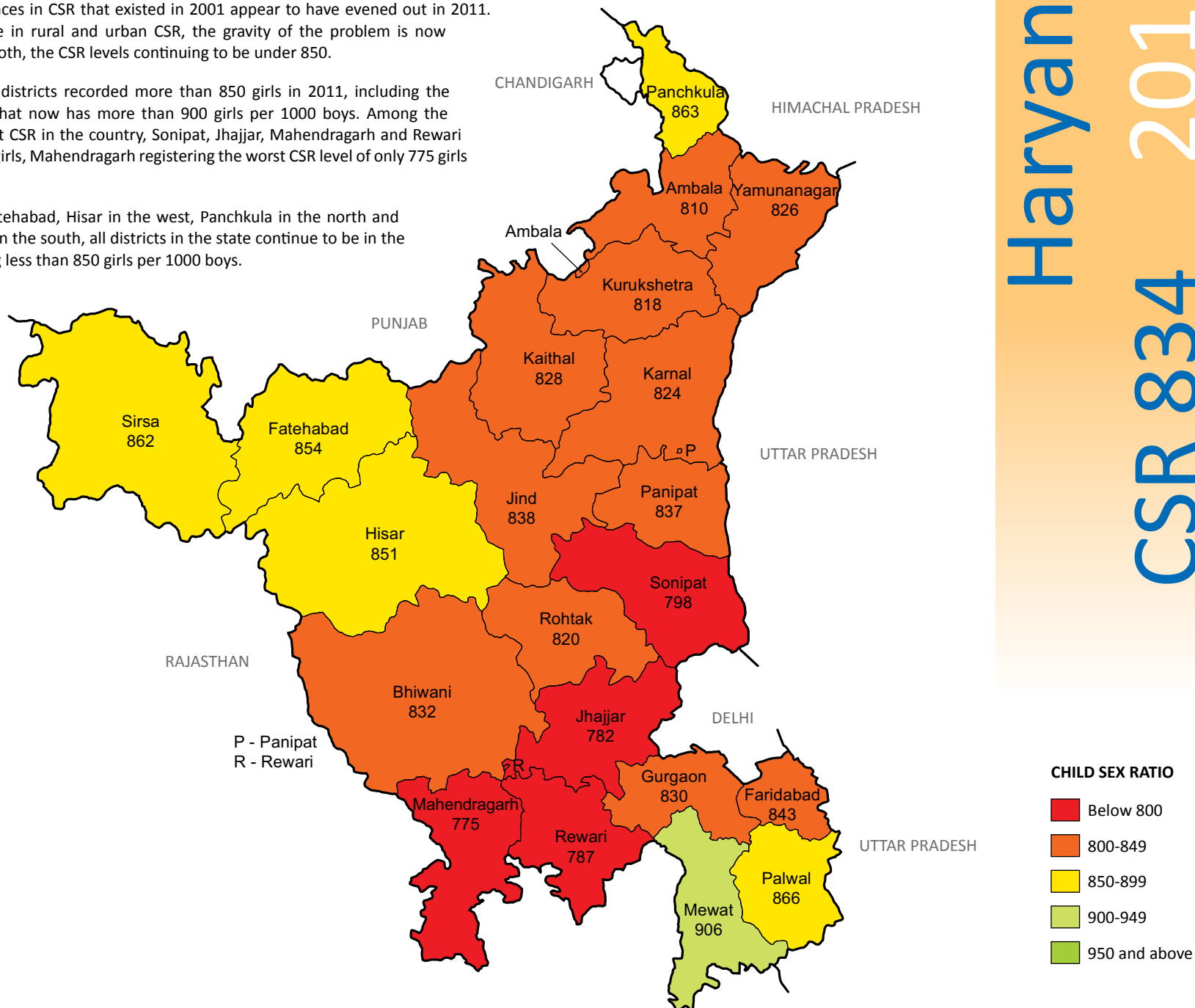
Haryana

CSR 834 2011

In 2011, the CSR in Haryana increased by 15 points to reach 834, up from 819 in 2001. Though the CSR still compares poorly with the 1991 levels and expected normal ratios, the rural-urban differences in CSR that existed in 2001 appear to have evened out in 2011. Despite an increase in rural and urban CSR, the gravity of the problem is now shared equally by both, the CSR levels continuing to be under 850.

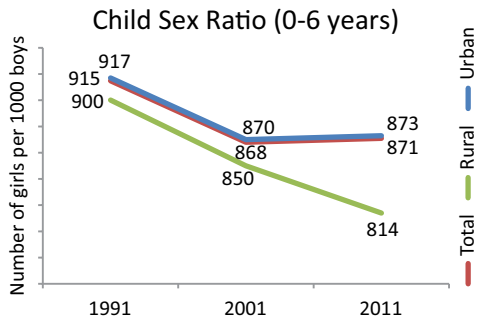
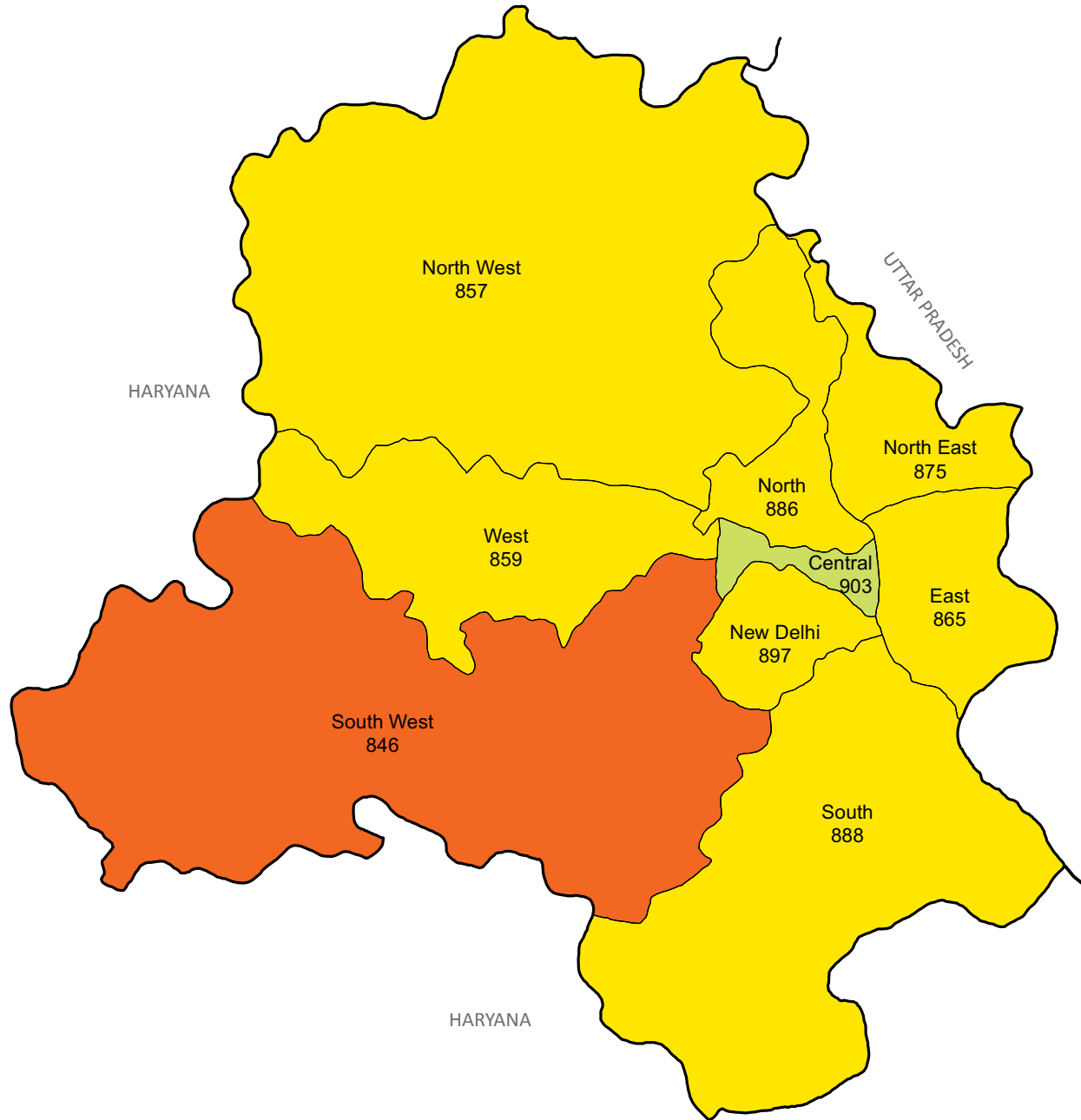
Six of the total 21 districts recorded more than 850 girls in 2011, including the district of Mewat that now has more than 900 girls per 1000 boys. Among the districts with lowest CSR in the country, Sonipat, Jhajjar, Mahendragarh and Rewari have less than 800 girls, Mahendragarh registering the worst CSR level of only 775 girls per 1000 boys.

Except for Sirsa, Fatehabad, Hisar in the west, Panchkula in the north and Mewat and Palwal in the south, all districts in the state continue to be in the 'red zone' recording less than 850 girls per 1000 boys.



NCT of Delhi

CSR 868 2001

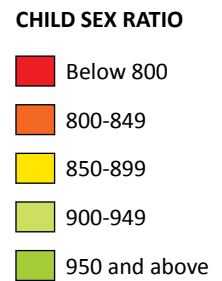
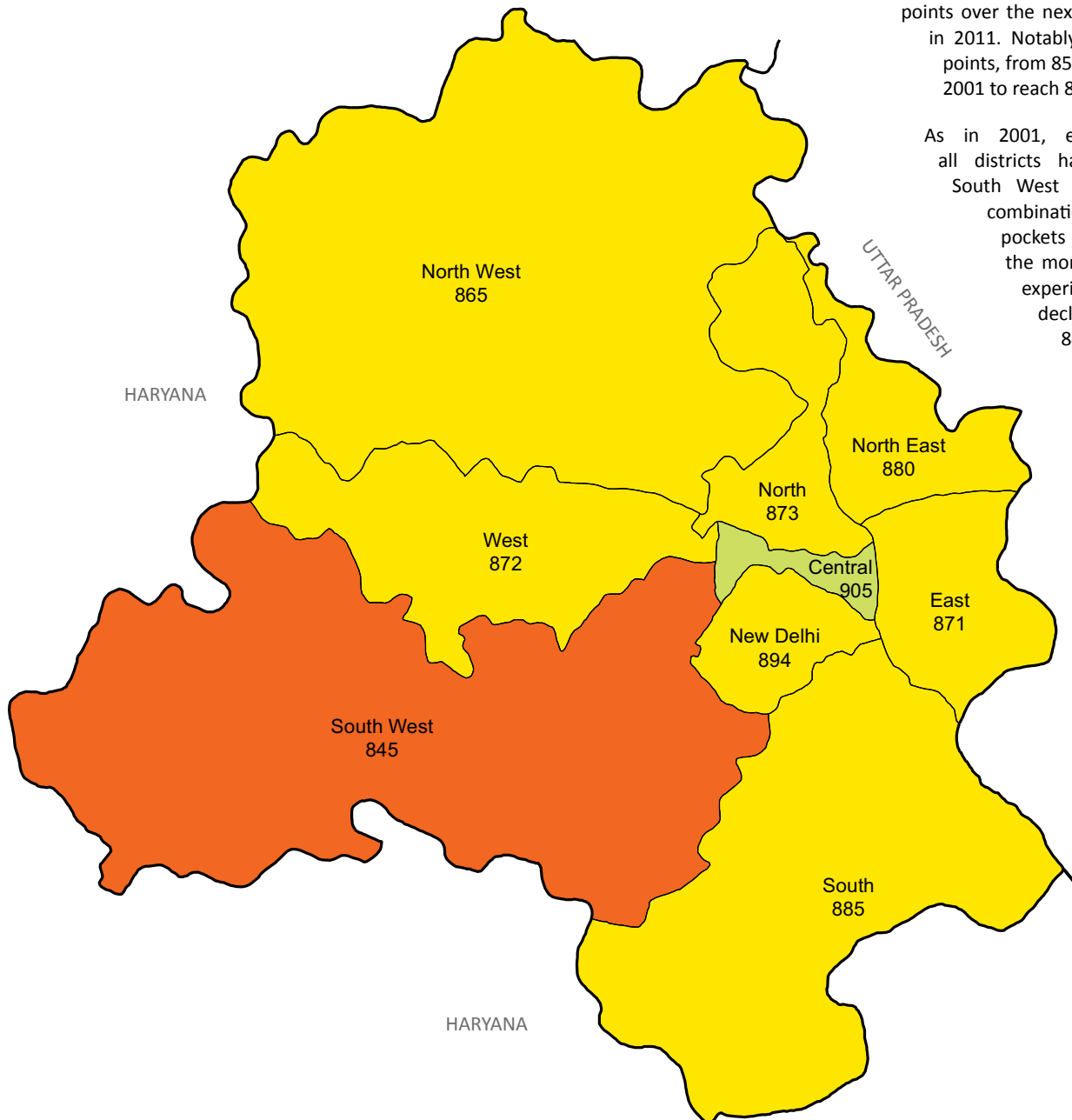


NCT of Delhi

CSR 871 2011

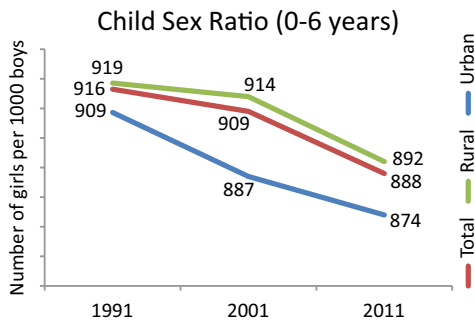
In 1991 Delhi had a CSR of 915 girls to 1000 boys. Between 1991 and 2001, the state experienced a sharp decline in CSR of 47 points bringing down the state average to 868 girls per 1000 boys. The overall CSR increased by a marginal 3 points over the next decade to reach 871 in 2011. Notably, rural CSR fell by 36 points, from 850 girls per 1000 boys in 2001 to reach 814 in 2011.

As in 2001, except Central Delhi, all districts have CSR below 900. South West Delhi, representing a combination of urban and rural pockets and counted among the more prosperous districts, experienced a further 1 point decline to reach a CSR of 845 girls per 1000 boys. The districts of New Delhi, North and South Delhi also recorded declines in CSR, the overall picture remaining almost as adverse as in 2001.



Rajasthan

CSR 909 2001



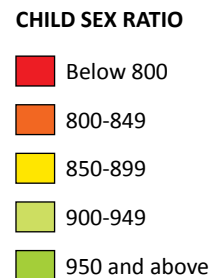
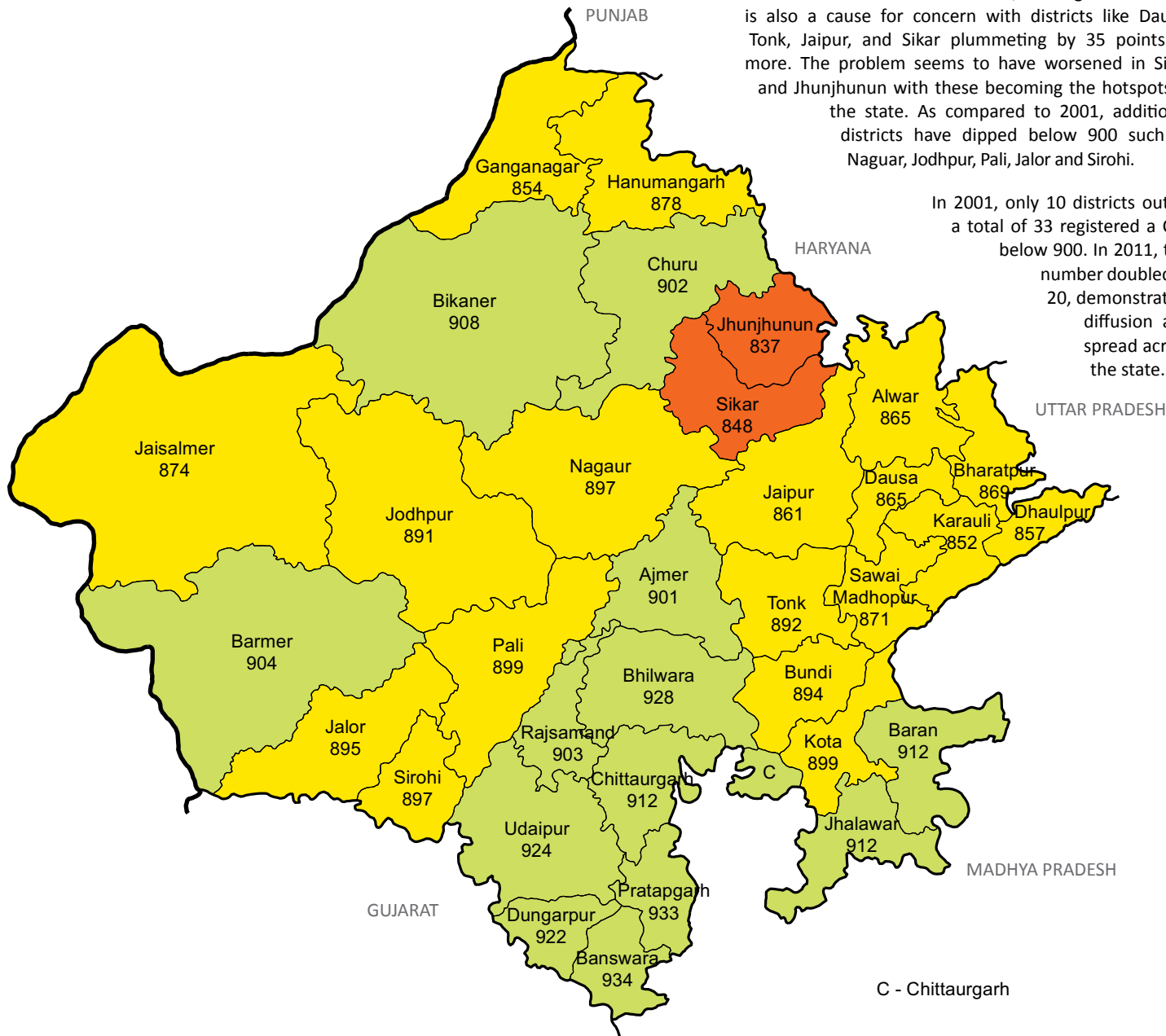
Rajasthan 2011

CSR 888

The CSR in Rajasthan has been declining consistently from 916 girls per 1000 boys in 1991 to 909 in 2001 and further by 21 points to reach 888 in 2011. The decline in CSR in rural areas was significantly higher than in urban areas, though both rural and urban areas recorded CSR below 900.

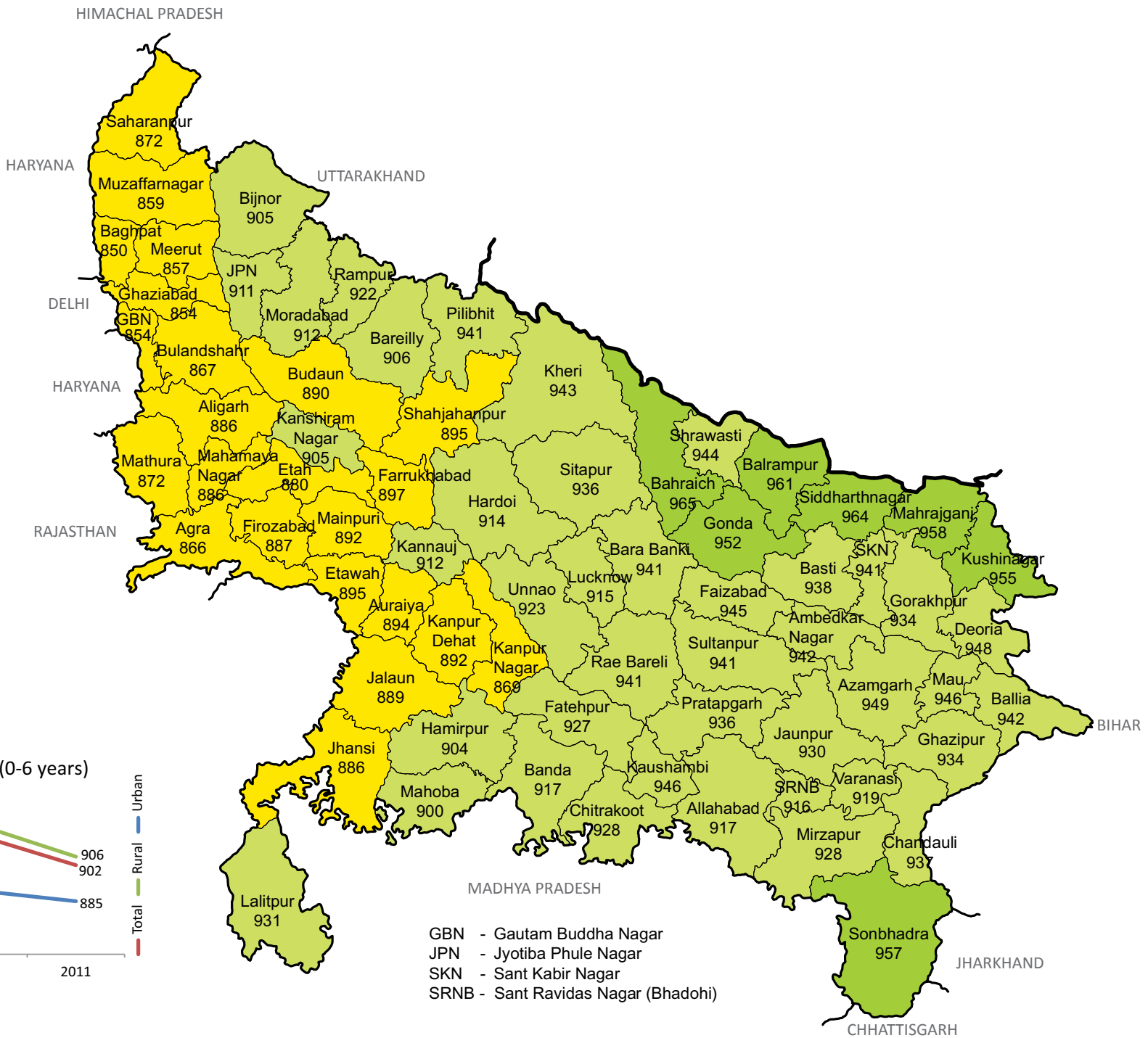
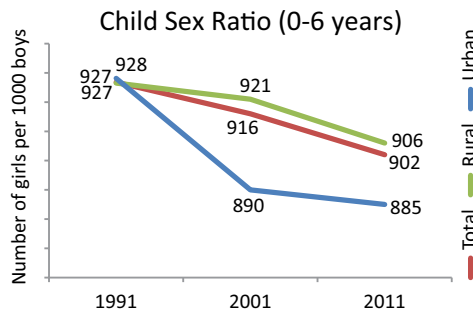
In addition to the state-wide decline, the degree of decline is also a cause for concern with districts like Dausa, Tonk, Jaipur, and Sikar plummeting by 35 points or more. The problem seems to have worsened in Sikar and Jhunjhunun with these becoming the hotspots in the state. As compared to 2001, additional districts have dipped below 900 such as Nagaur, Jodhpur, Pali, Jalor and Sirohi.

In 2001, only 10 districts out of a total of 33 registered a CSR below 900. In 2011, this number doubled to 20, demonstrating diffusion and spread across the state.



Uttar Pradesh

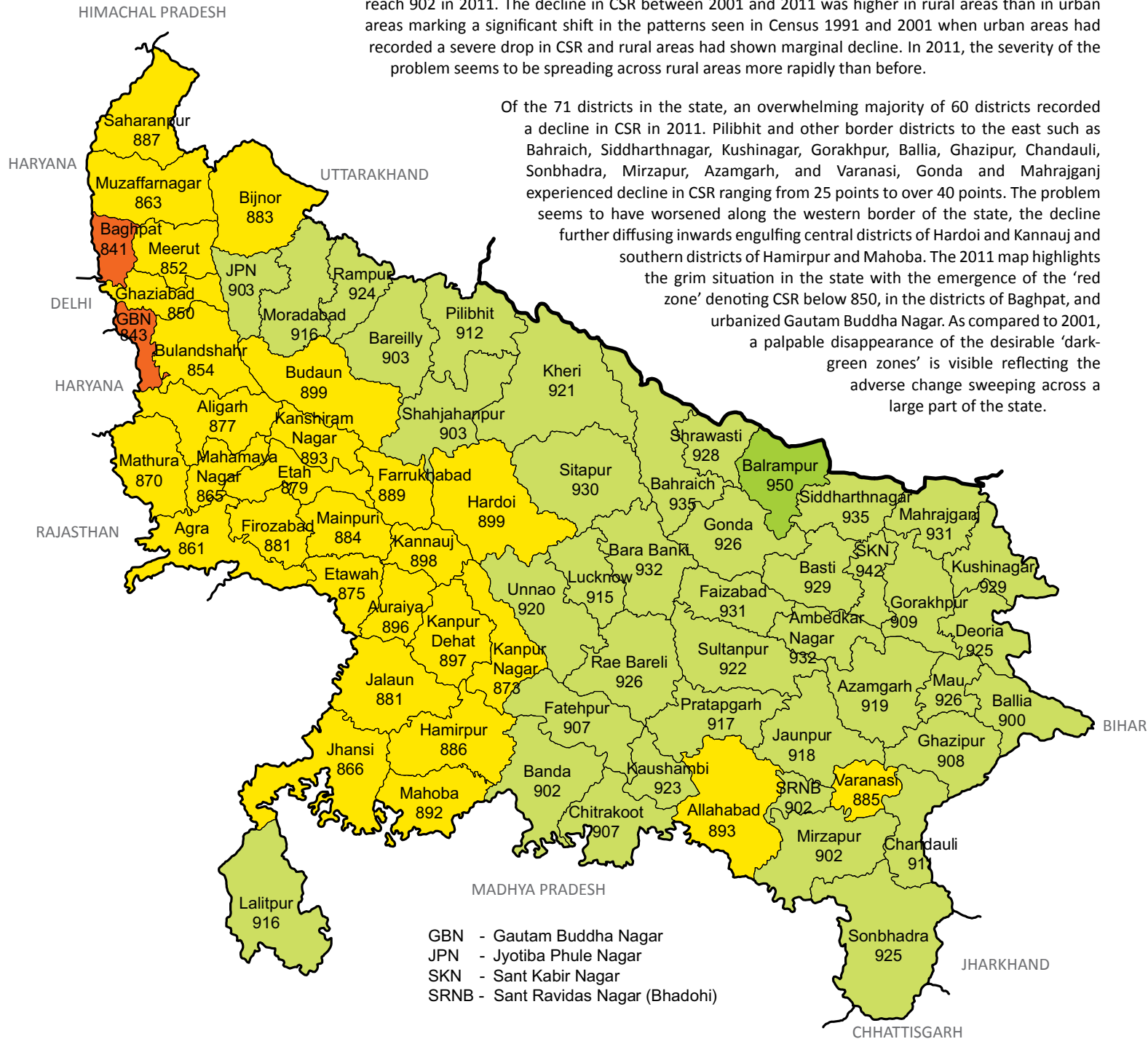
CSR 916 2001

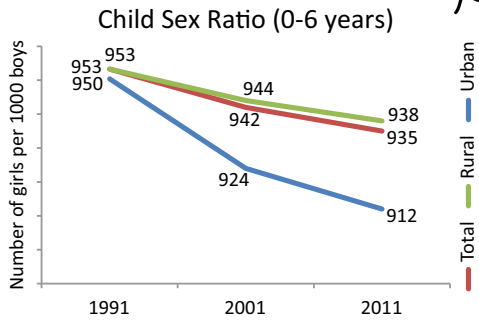
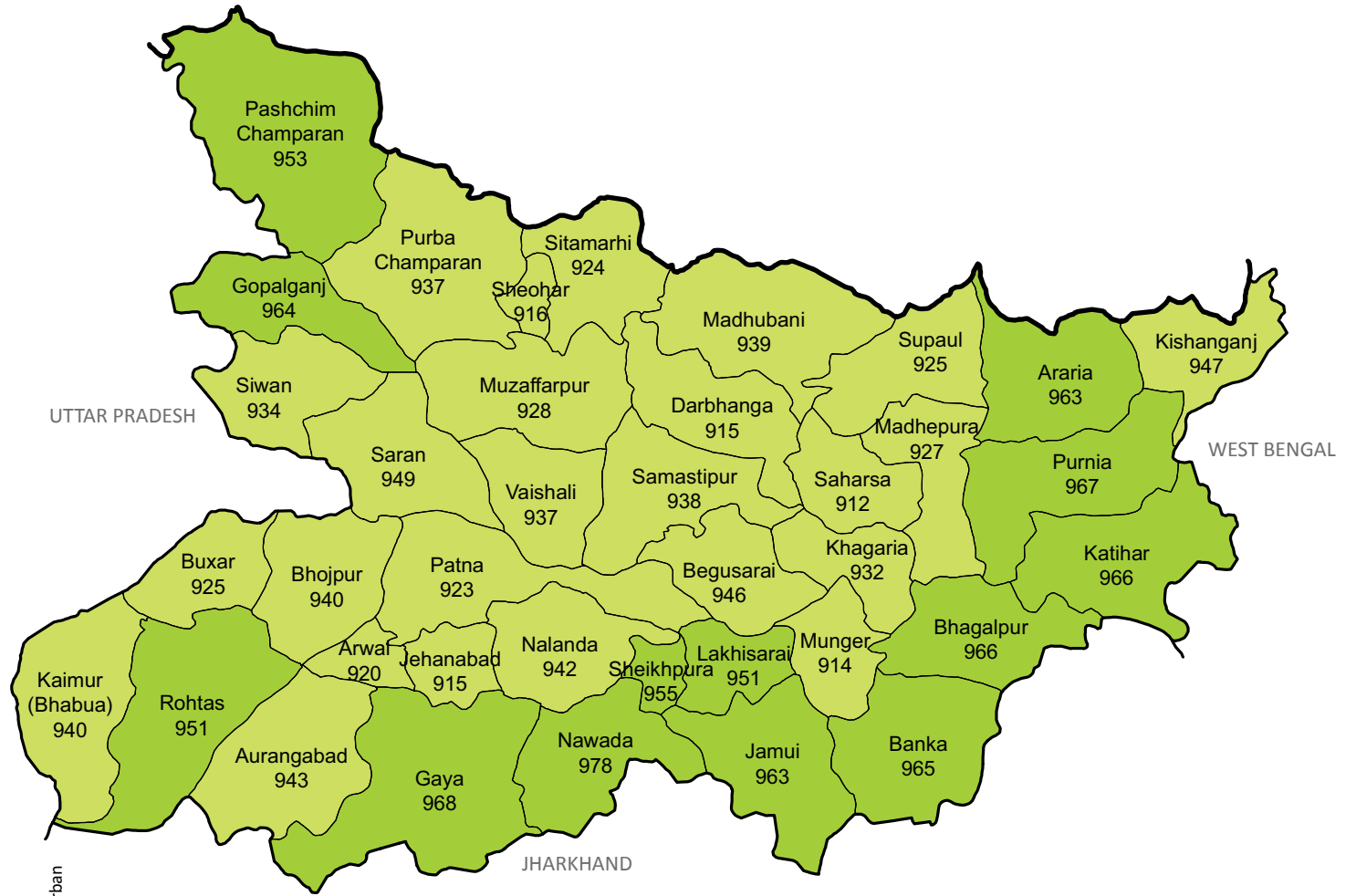


Uttar Pradesh CSR 902 2011

The CSR in U.P. declined from 927 girls for every 1000 boys in 1991 to 916 in 2001 dropping further to reach 902 in 2011. The decline in CSR between 2001 and 2011 was higher in rural areas than in urban areas marking a significant shift in the patterns seen in Census 1991 and 2001 when urban areas had recorded a severe drop in CSR and rural areas had shown marginal decline. In 2011, the severity of the problem seems to be spreading across rural areas more rapidly than before.

Of the 71 districts in the state, an overwhelming majority of 60 districts recorded a decline in CSR in 2011. Pilibhit and other border districts to the east such as Bahraich, Siddharthnagar, Kushinagar, Gorakhpur, Ballia, Ghazipur, Chandauli, Sonbhadra, Mirzapur, Azamgarh, and Varanasi, Gonda and Mahrajganj experienced decline in CSR ranging from 25 points to over 40 points. The problem seems to have worsened along the western border of the state, the decline further diffusing inwards engulfing central districts of Hardoi and Kannauj and southern districts of Hamirpur and Mahoba. The 2011 map highlights the grim situation in the state with the emergence of the 'red zone' denoting CSR below 850, in the districts of Baghpat, and urbanized Gautam Buddha Nagar. As compared to 2001, a palpable disappearance of the desirable 'dark-green zones' is visible reflecting the adverse change sweeping across a large part of the state.





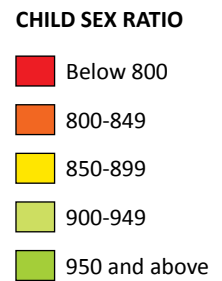
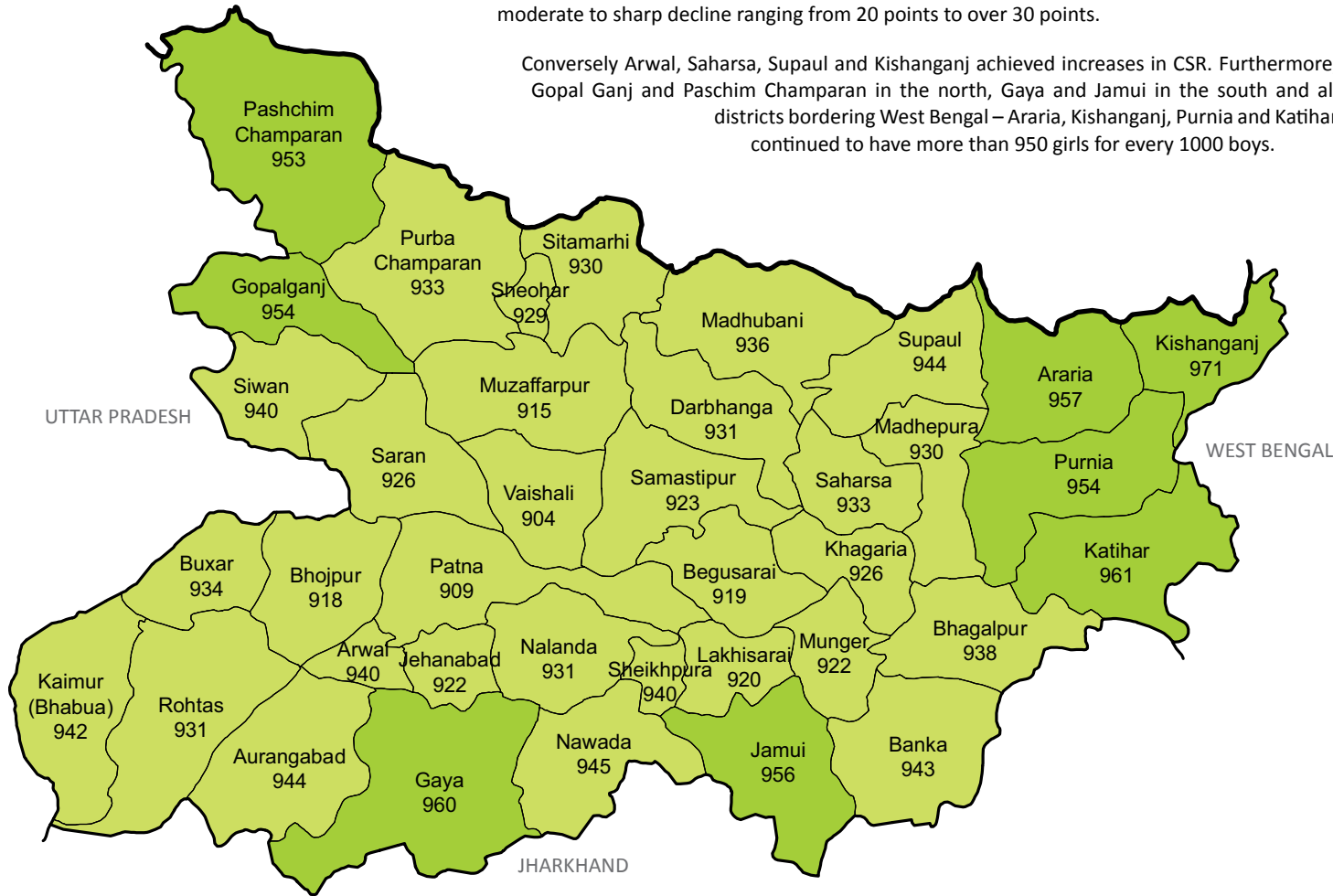
Bihar 2011

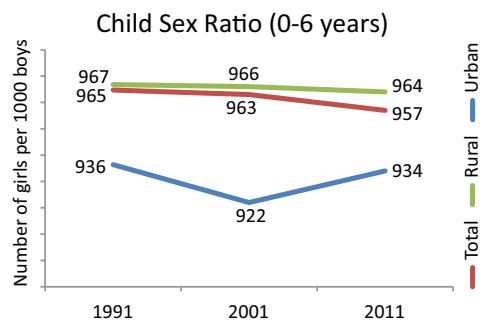
CSR 935

Bihar has been experiencing a steady decline in CSR from 953 girls per 1000 boys in 1991 to 942 in 2001 and to 935 in 2011. Though both urban and rural CSR declined in 2011, with only 912 girls to 1000 boys the urban ratio declined more steeply than rural.

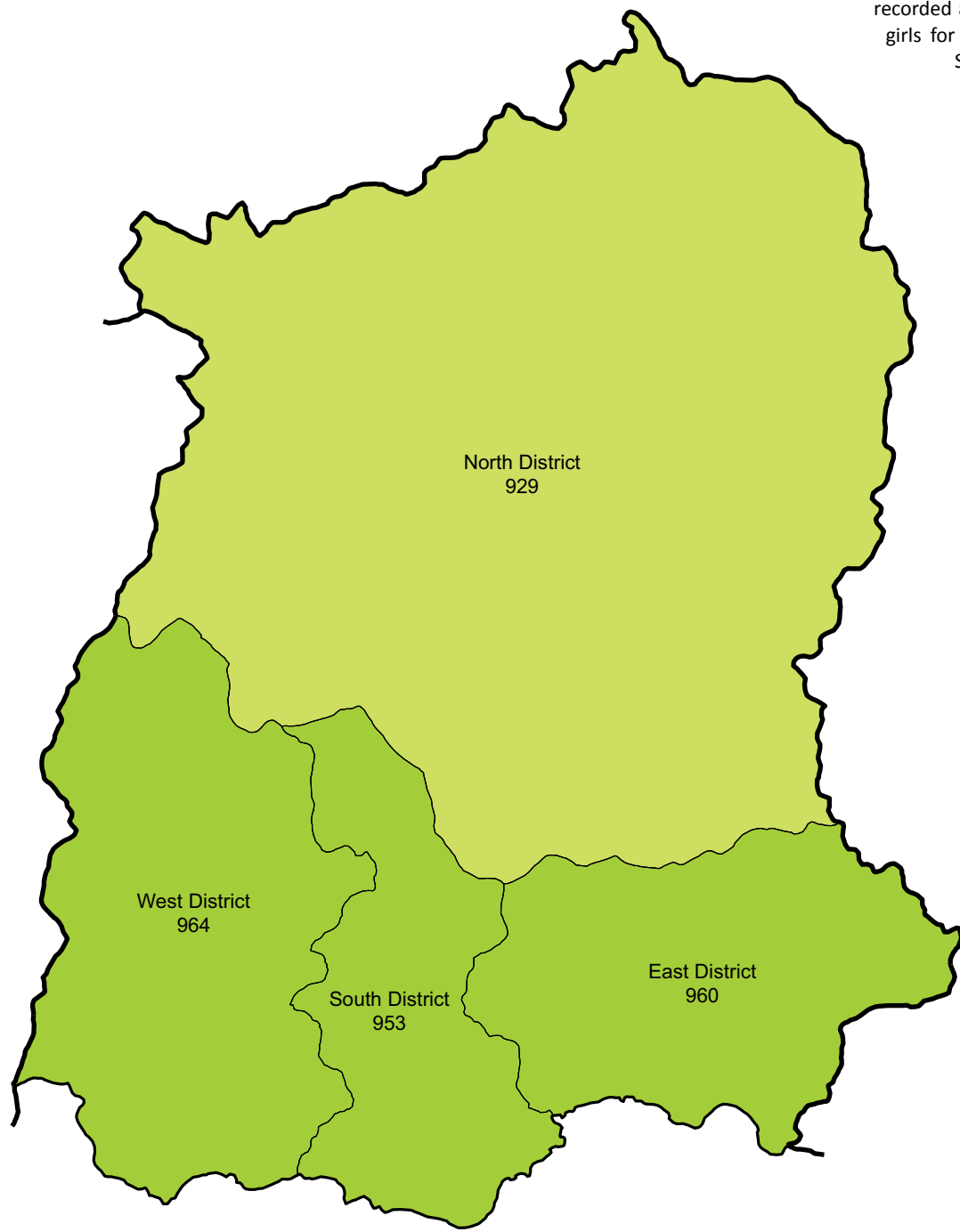
Large number of districts in the state experienced a decline in CSR. Districts such as Bhagalpur, Banka, Lakhisarai, Begusarai, Nawada, Nalanda, Arwal, Rohtas, Vaishali and Saran showed moderate to sharp decline ranging from 20 points to over 30 points.

Conversely Arwal, Saharsa, Supaul and Kishanganj achieved increases in CSR. Furthermore, Gopal Ganj and Paschim Champaran in the north, Gaya and Jamui in the south and all districts bordering West Bengal – Araria, Kishanganj, Purnia and Katihar continued to have more than 950 girls for every 1000 boys.





WEST BENGAL



WEST BENGAL

Between 1991 and 2001, Sikkim recorded a decline in CSR from 965 girls for every 1000 boys to 963. Subsequently, there was a further drop of 6 points observed in 2011, bringing the ratio to 957. While rural areas experienced a marginal decline of 2 points, urban areas recorded an increase by 12 points.

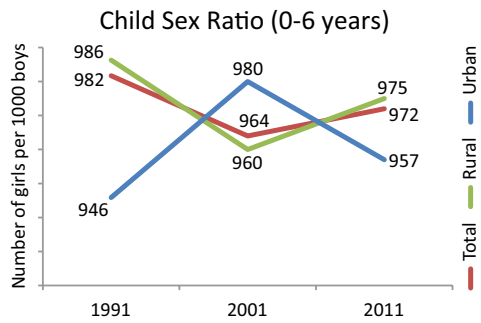
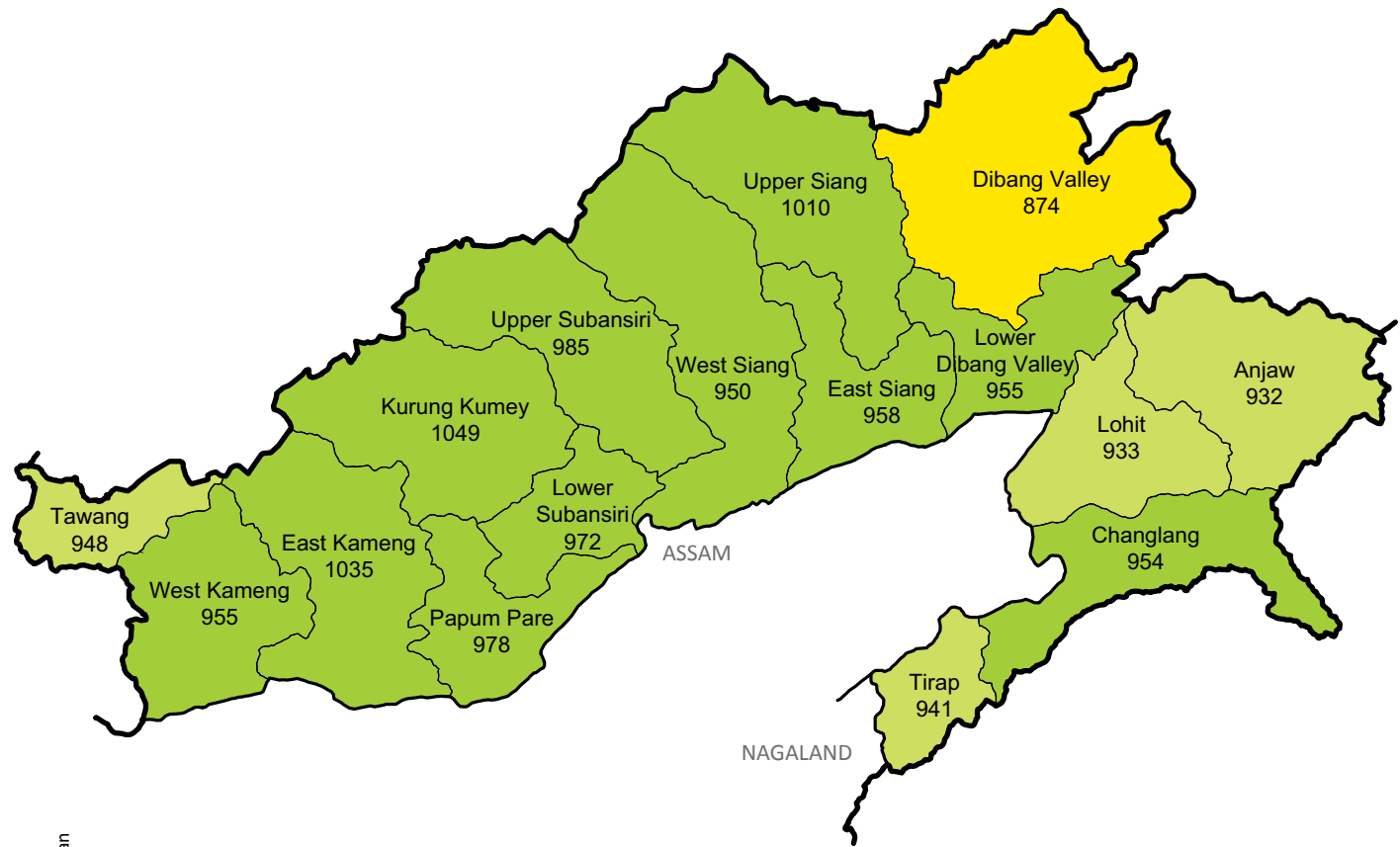
The drastic decline of 66 points in the large North district brought down the CSR to a low 929. The South district too recorded a 16 point decline indicating the increasing gravity of the problem in this district.

CHILD SEX RATIO

- Below 800
- 800-849
- 850-899
- 900-949
- 950 and above

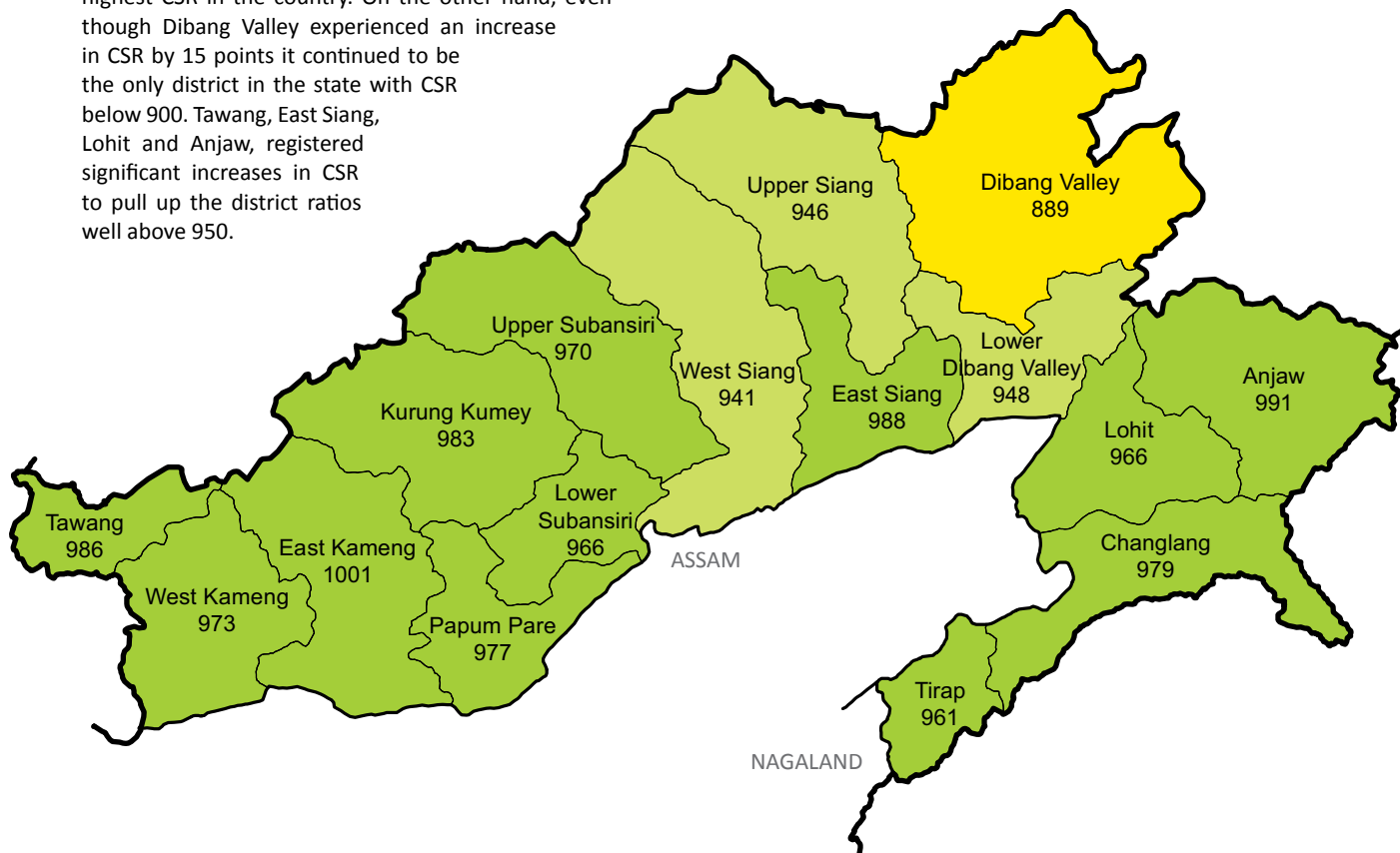
Arunachal Pradesh

CSR 964 2001



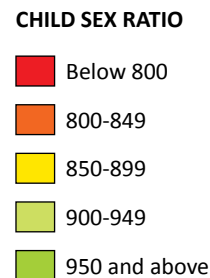
While CSR in Arunachal Pradesh remained lower than 1991 levels (982), it increased from 964 in 2001 to 972 in 2011. This is the highest recorded CSR in the country. The state presents a mixed picture of both positive and negative changes in CSR: CSR in rural areas increased by 15 points in the last decade, while the ratio in urban areas dropped moderately by 23 points.

In 2001, East Kameng, Kurung Kumey, and Upper Siang had CSR above 1000. In the last decade, these districts recorded drops by 34, 66, and 64 points respectively. In spite of the decline, with 1001 girls to 1000 boys, East Kameng has the third highest CSR in the country. On the other hand, even though Dibang Valley experienced an increase in CSR by 15 points it continued to be the only district in the state with CSR below 900. Tawang, East Siang, Lohit and Anjaw, registered significant increases in CSR to pull up the district ratios well above 950.



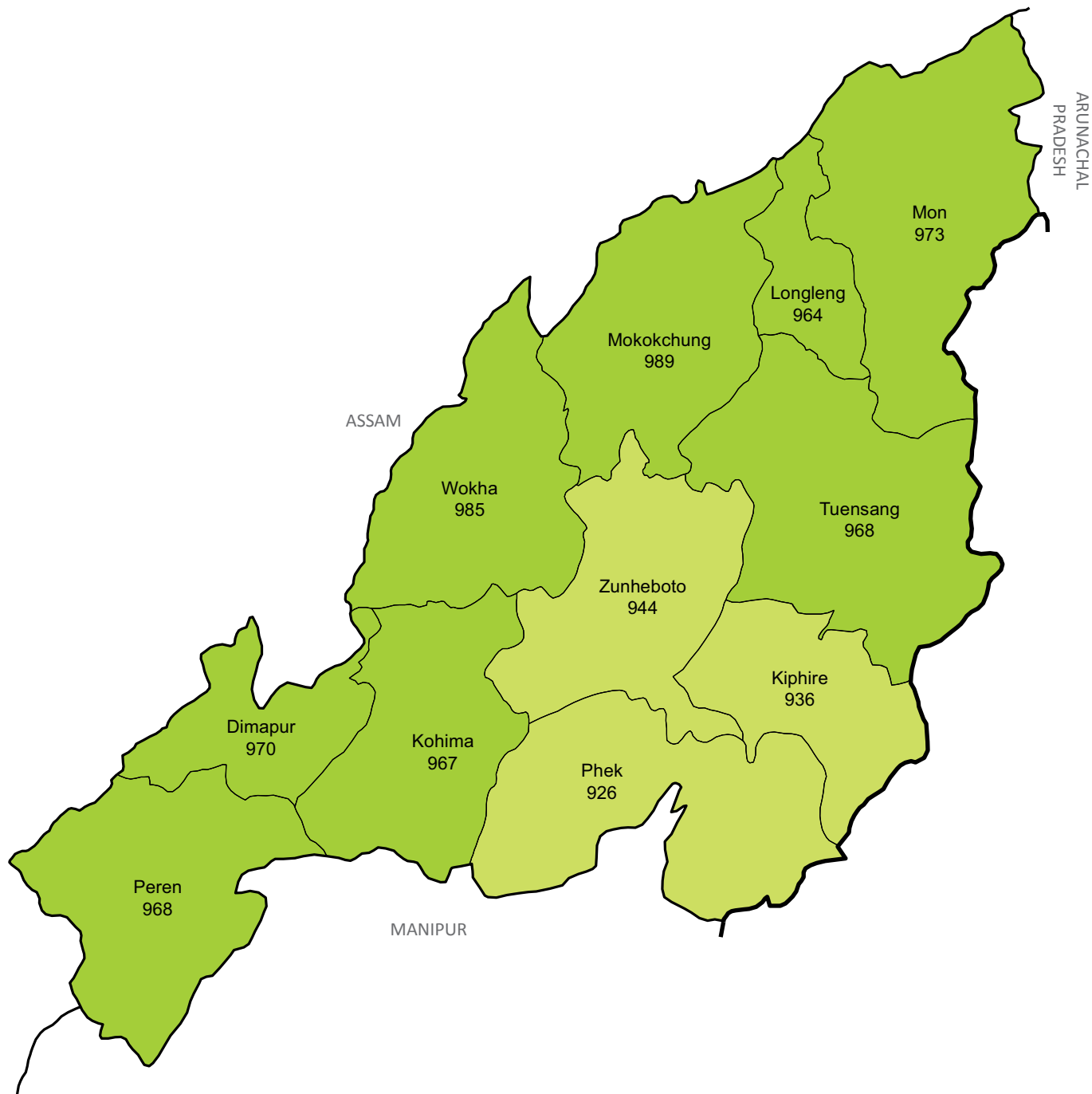
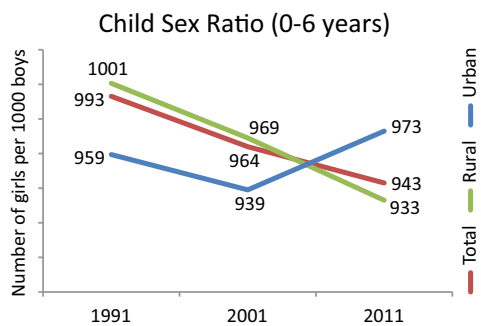
Arunachal Pradesh

CSR 972 2011



Nagaland

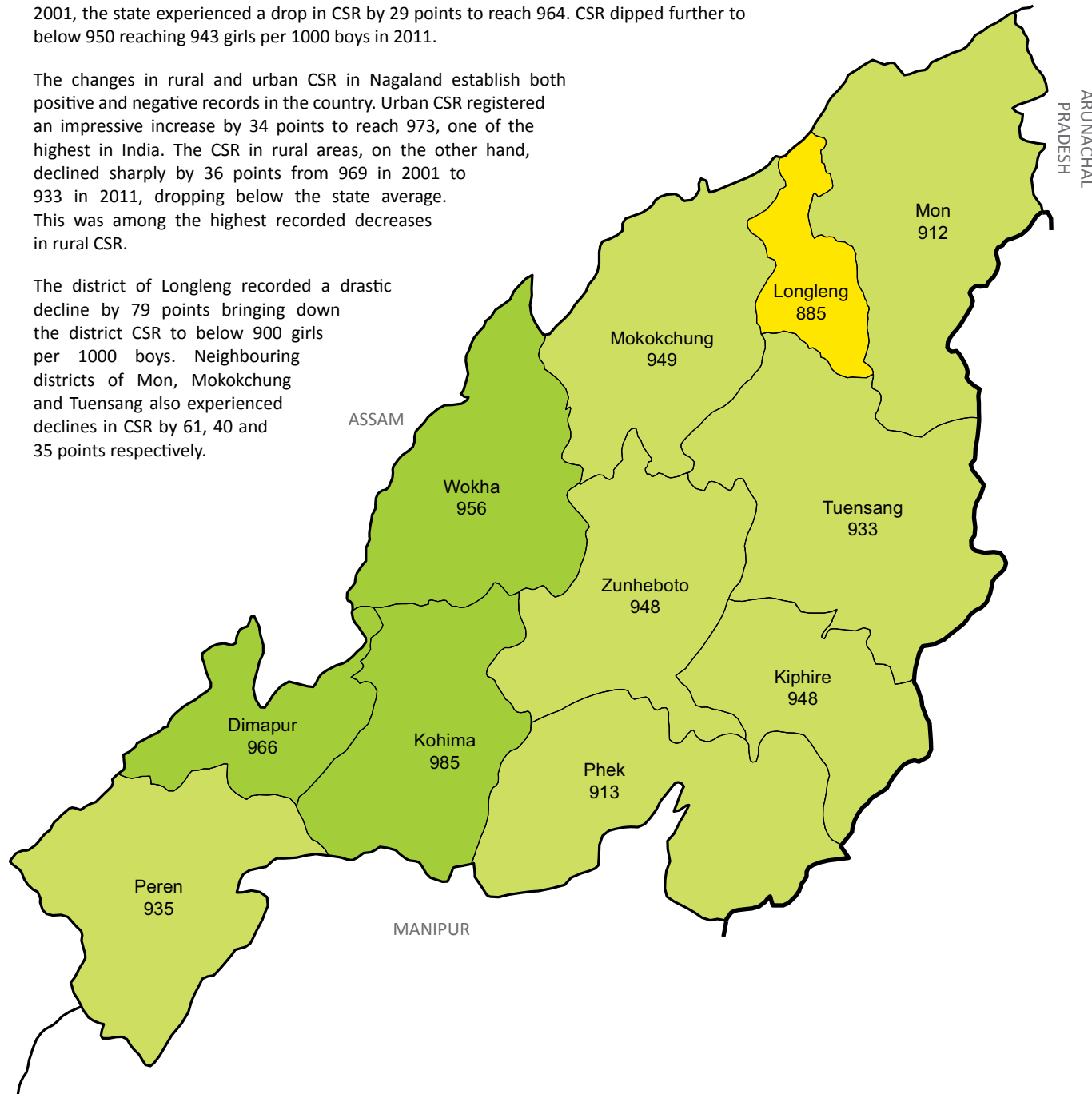
CSR 964 2001



In 1991, Nagaland had one of the highest CSR in the country, equalling 993. Between 1991 and 2001, the state experienced a drop in CSR by 29 points to reach 964. CSR dipped further to below 950 reaching 943 girls per 1000 boys in 2011.

The changes in rural and urban CSR in Nagaland establish both positive and negative records in the country. Urban CSR registered an impressive increase by 34 points to reach 973, one of the highest in India. The CSR in rural areas, on the other hand, declined sharply by 36 points from 969 in 2001 to 933 in 2011, dropping below the state average. This was among the highest recorded decreases in rural CSR.

The district of Longleng recorded a drastic decline by 79 points bringing down the district CSR to below 900 girls per 1000 boys. Neighbouring districts of Mon, Mokokchung and Tuensang also experienced declines in CSR by 61, 40 and 35 points respectively.



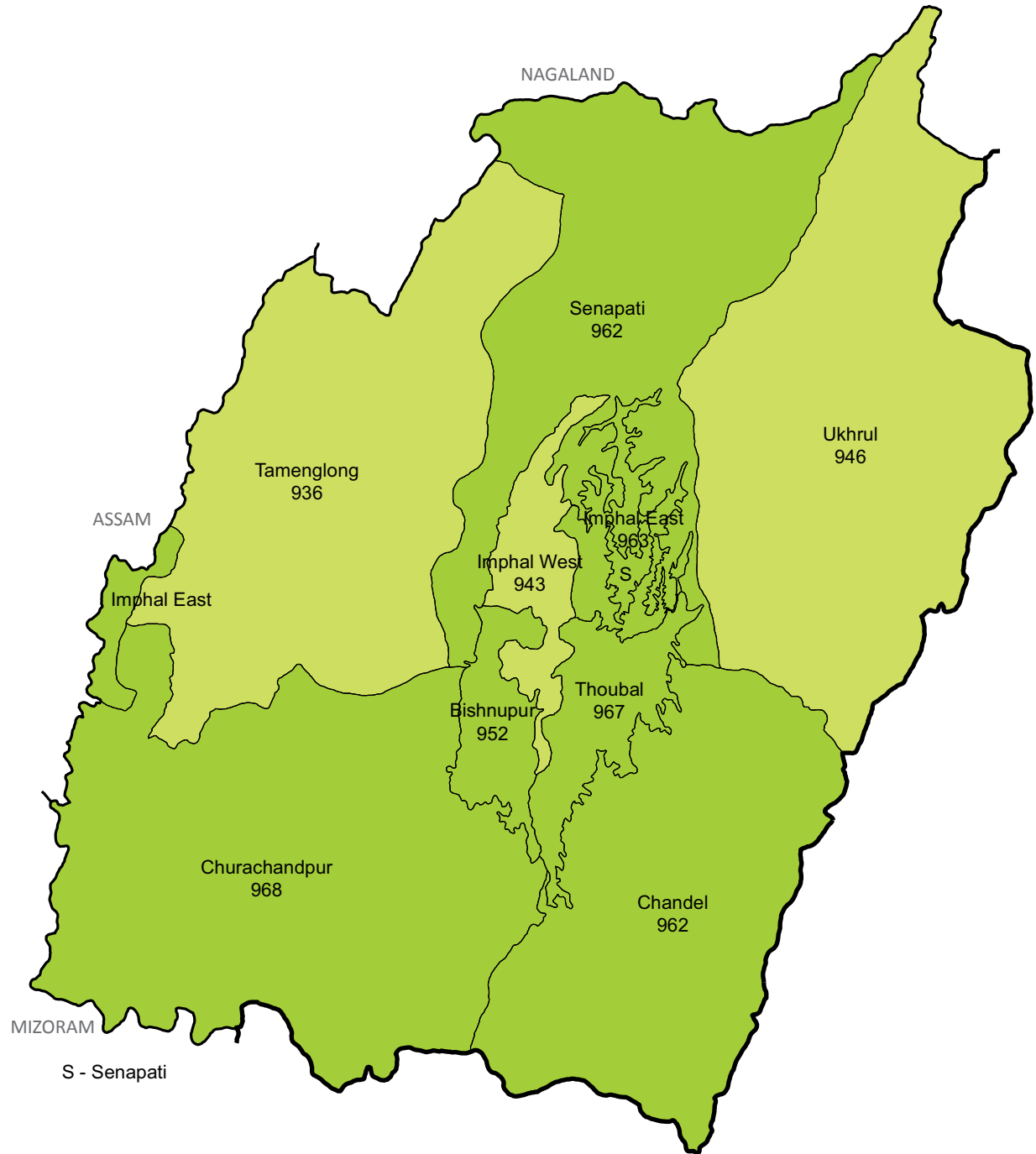
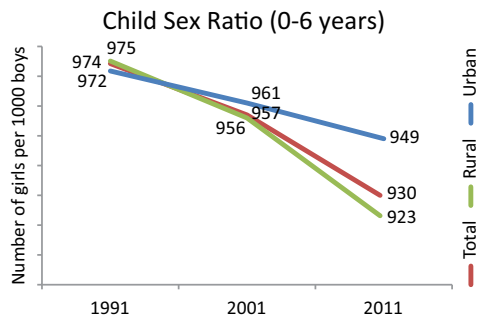
Nagaland

CSR 943 2011

- CHILD SEX RATIO**
- Below 800
 - 800-849
 - 850-899
 - 900-949
 - 950 and above

Manipur

CSR 957 2001



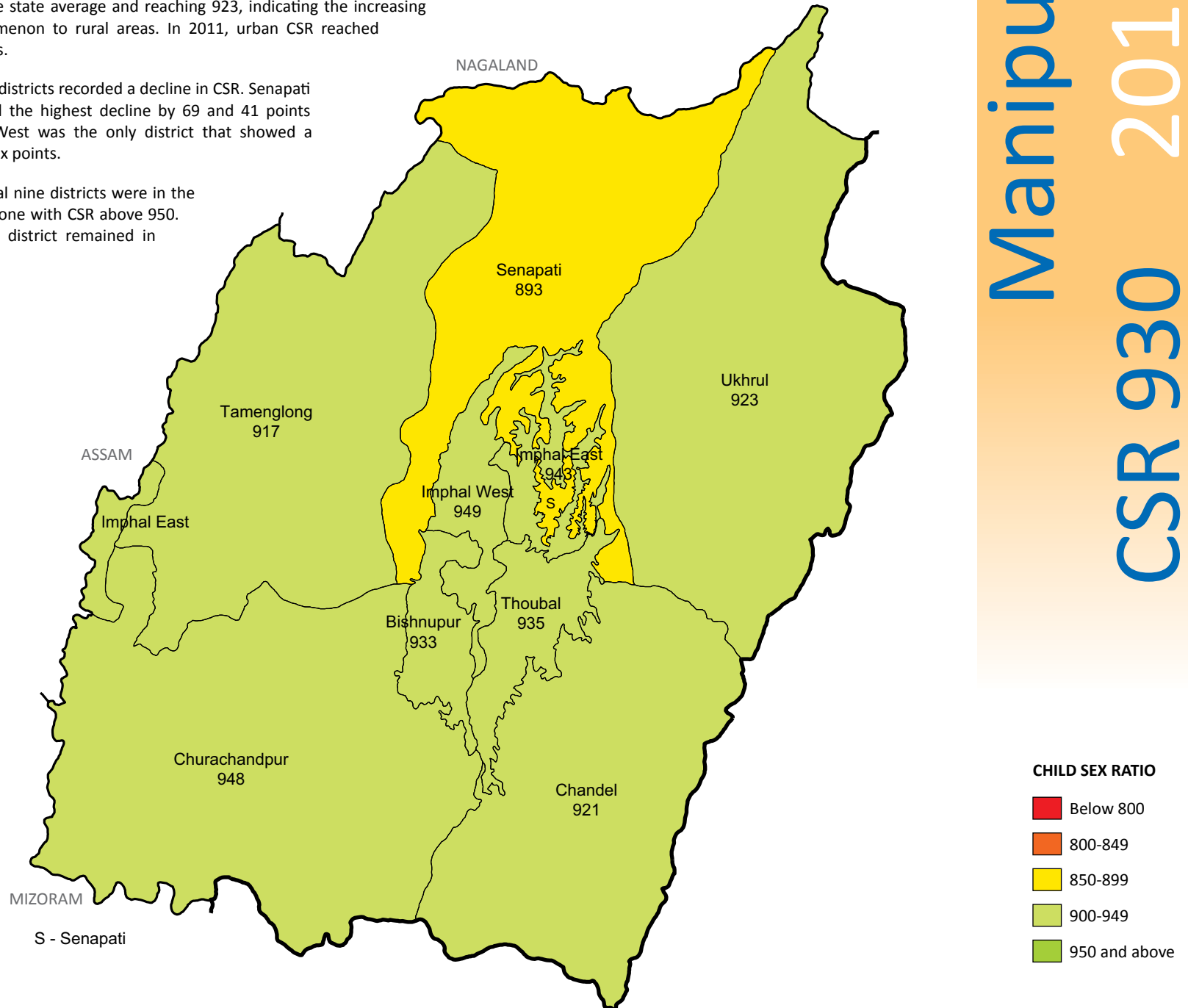
Manipur 2011

CSR 930

Manipur has been experiencing steady decline in CSR: from 974 girls per 1000 boys in 1991 to 957 in 2001 and to 930 in 2011. The rural decline was sharper with the CSR dipping below the state average and reaching 923, indicating the increasing spread of the phenomenon to rural areas. In 2011, urban CSR reached 949 girls per 1000 boys.

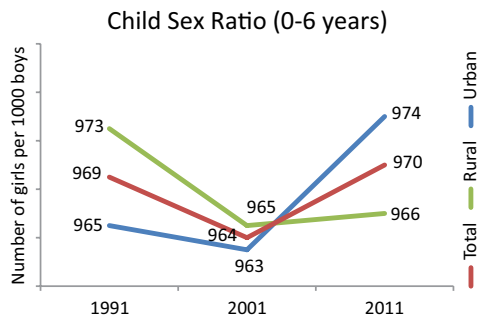
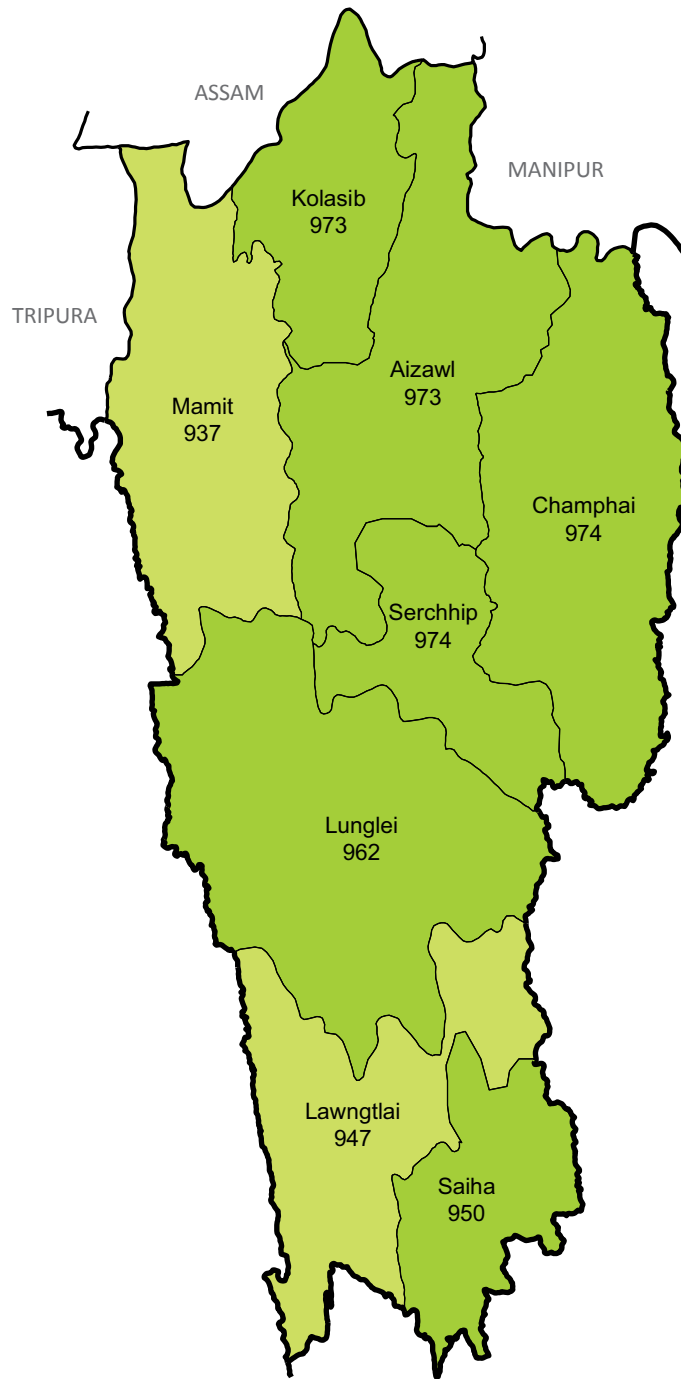
Eight of the total nine districts recorded a decline in CSR. Senapati and Chandel recorded the highest decline by 69 and 41 points respectively. Imphal West was the only district that showed a marginal increase by six points.

In 2001, six of the total nine districts were in the desirable dark green zone with CSR above 950. In 2011, not a single district remained in this category.



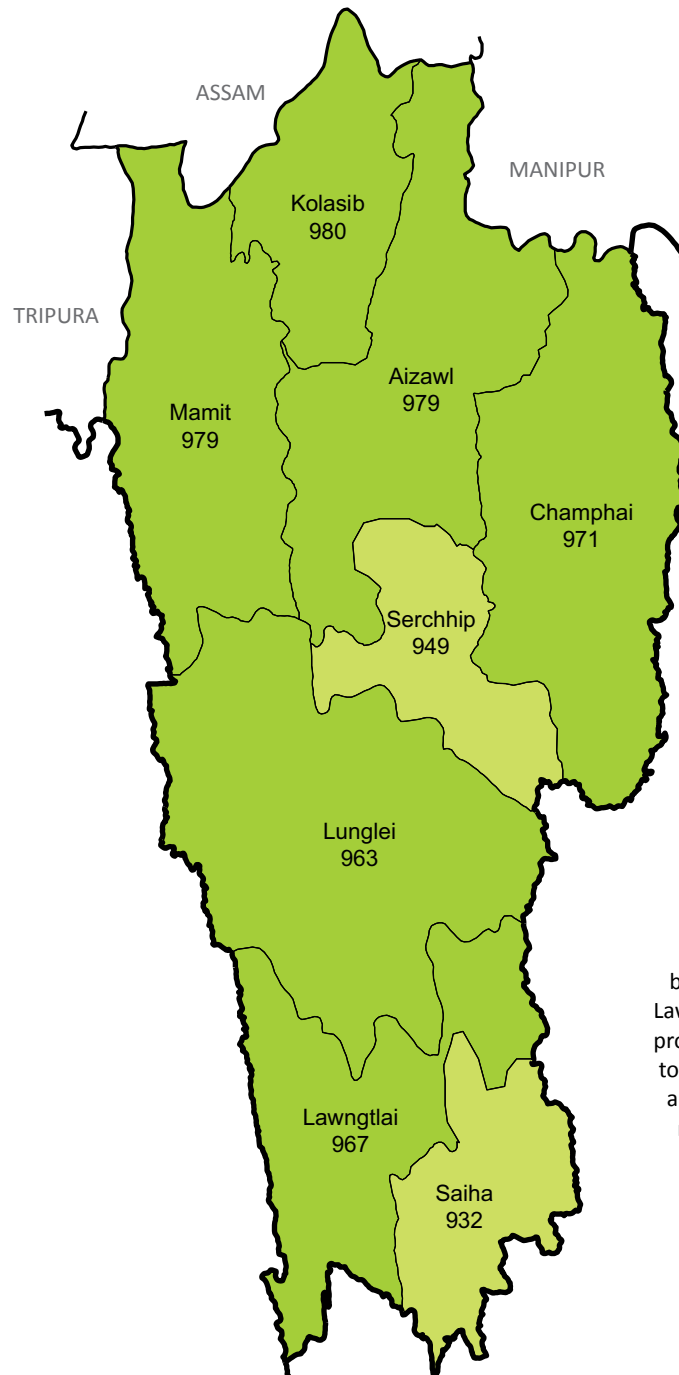
Mizoram

CSR 964 2001



Mizoram

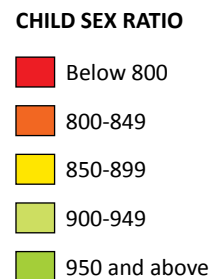
CSR 970 2011



Mizoram experienced a marginal decline in CSR from 969 to 964 girls to 1000 boys between 1991 and 2001. The ratio has since increased to 970, as registered in 2011. This is the first instance in which a state managed to record an increase in CSR above the 1991 level.

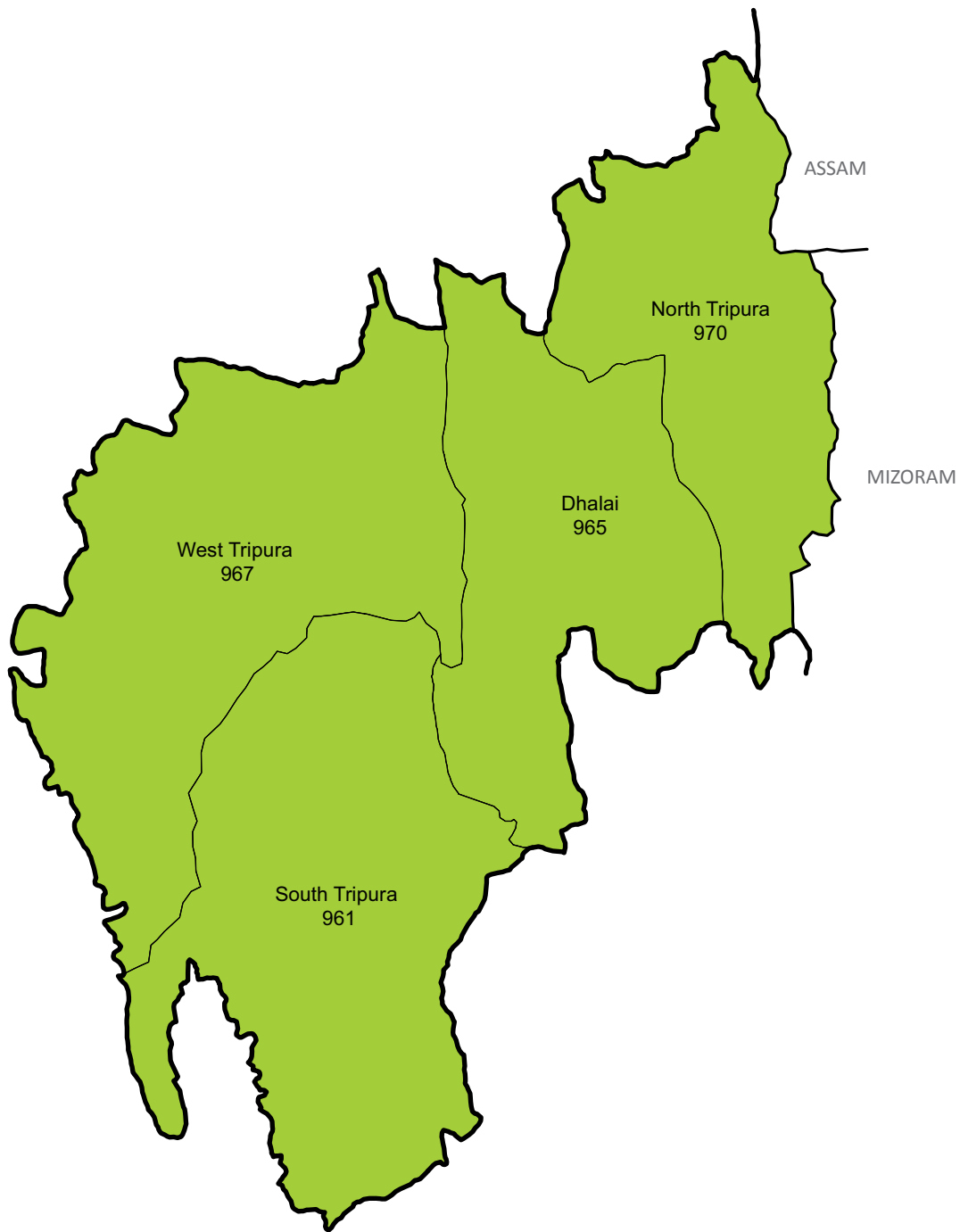
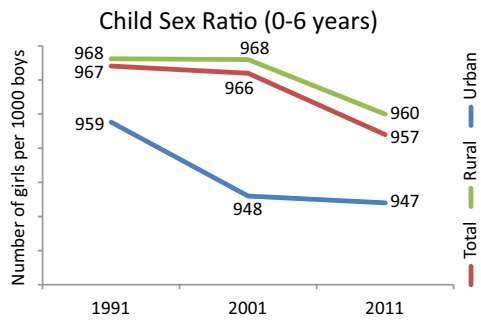
Both urban and rural areas recorded an increase in CSR, the increase being higher for urban areas. With an urban CSR of 974, Mizoram is the only other state next to Nagaland and the Union Territory of Puducherry to achieve an urban CSR above 970.

Of the total eight districts, five districts showed an increase in CSR. Mamit recorded the highest increase of 42 points pulling the district CSR above 950 girls per 1000 boys. From Mamit in the north and Lawngtlai in the south, the locus of the problem in 2011 seems to have shifted to their respective neighbours Serchhip and Saiha. CSR in Serchhip recorded a moderate decline of 25 points.



Tripura

CSR 966 2001

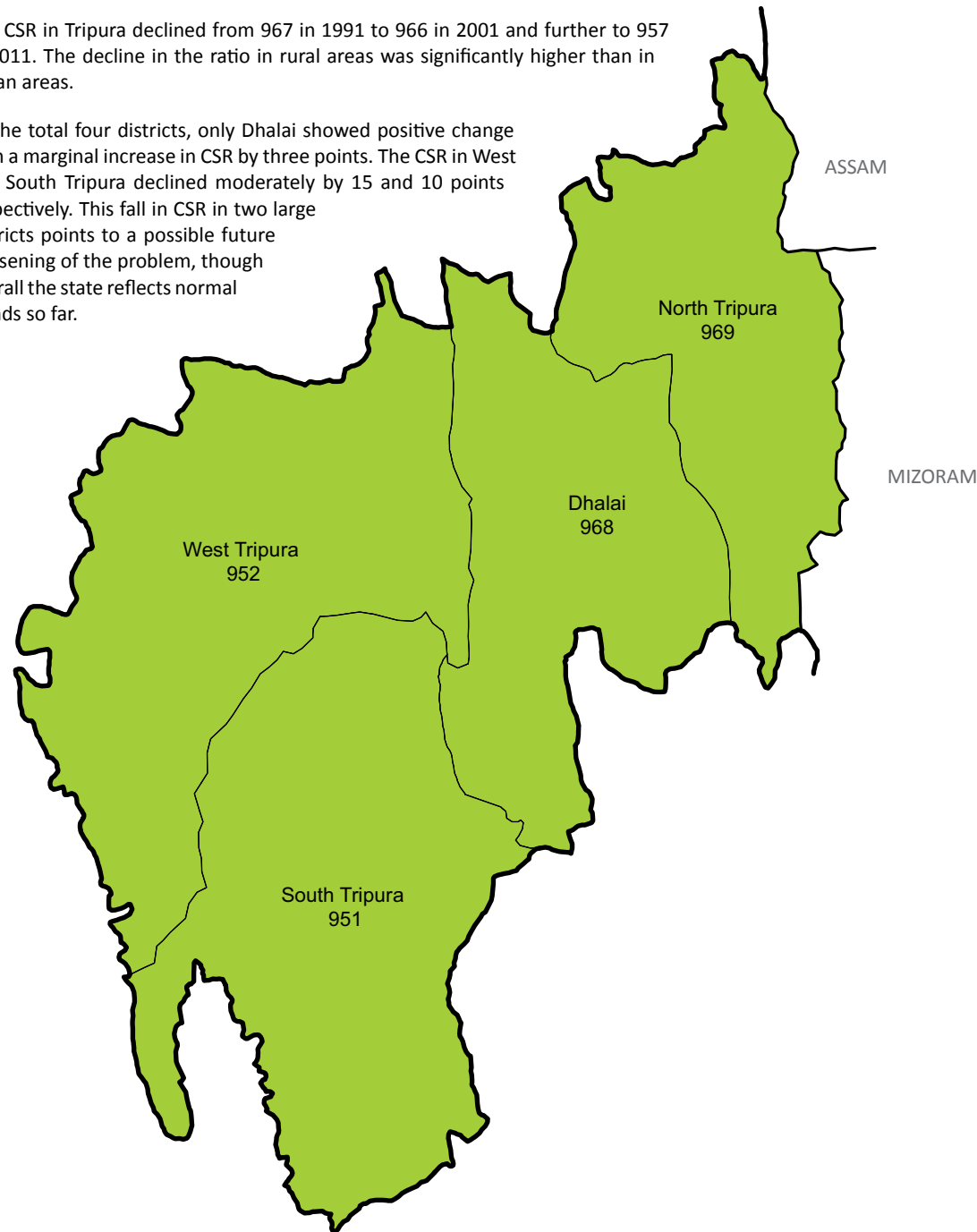


Tripura

CSR 957 2011

The CSR in Tripura declined from 967 in 1991 to 966 in 2001 and further to 957 in 2011. The decline in the ratio in rural areas was significantly higher than in urban areas.

Of the total four districts, only Dhalai showed positive change with a marginal increase in CSR by three points. The CSR in West and South Tripura declined moderately by 15 and 10 points respectively. This fall in CSR in two large districts points to a possible future worsening of the problem, though overall the state reflects normal trends so far.

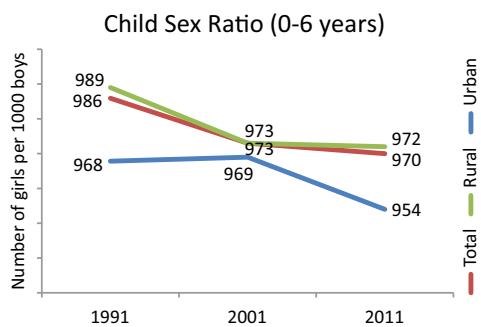
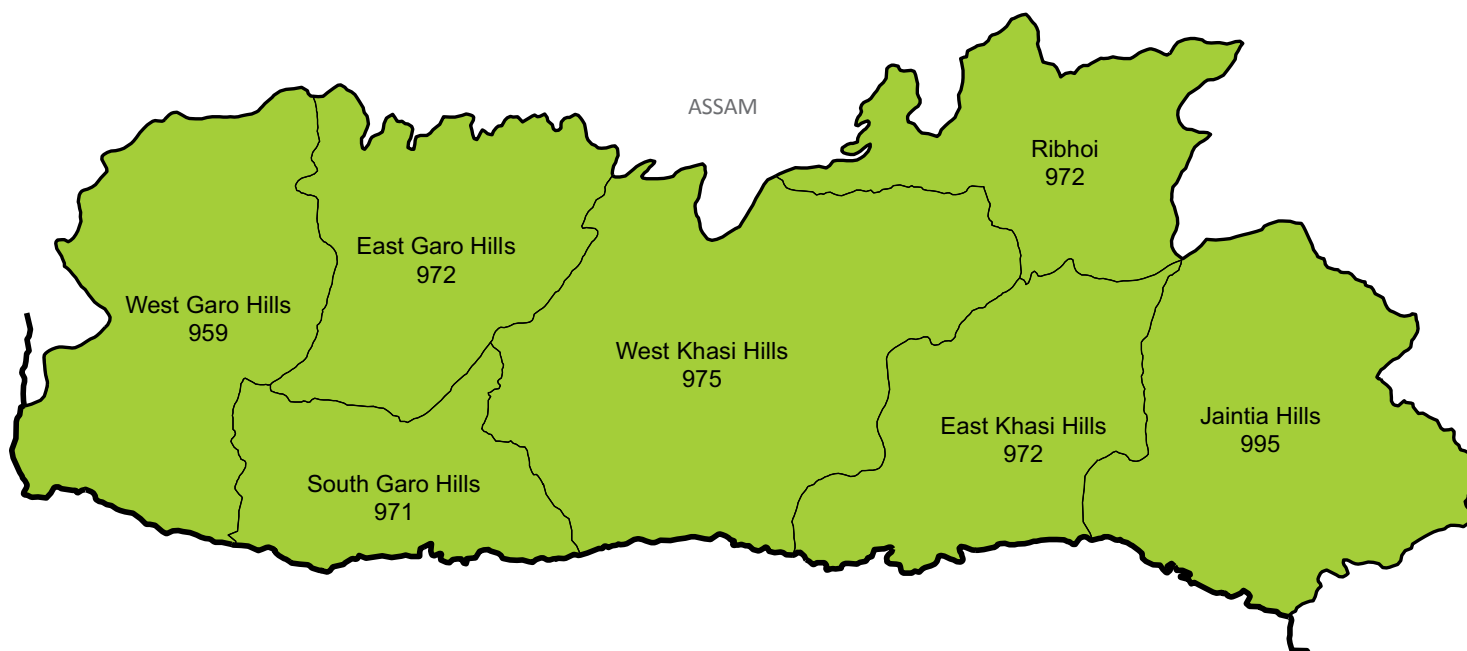


CHILD SEX RATIO

- Below 800
- 800-849
- 850-899
- 900-949
- 950 and above

Meghalaya

CSR 973 2001



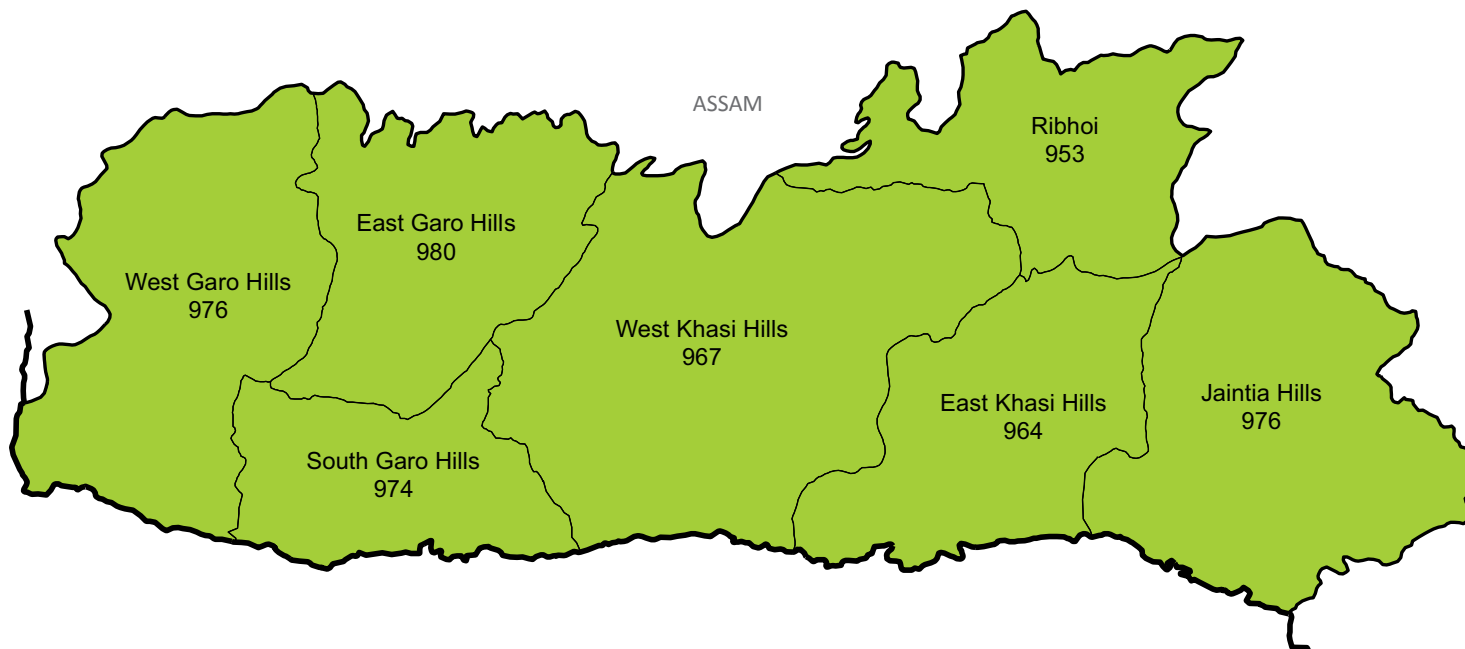
Meghalaya

CSR 970 2011

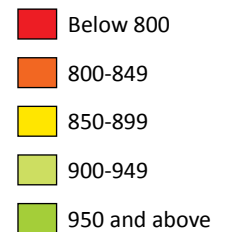
The CSR in Meghalaya dropped from 986 girls to 1000 boys in 1991 to 973 in 2001 and further to 970 in 2011. Urban CSR declined by 15 points to reach 954.

Jaintia Hills and Ribhoi recorded a moderate decline of 19 points. East Khasi Hills and West Khasi Hills also recorded declines in CSR. Conversely, West Garo Hills showed an increase in CSR from 959 to 976 girls per 1000 boys.

Although early signs of a possible future decline were visible, overall the ratio in all districts remained above the desirable 950 mark.

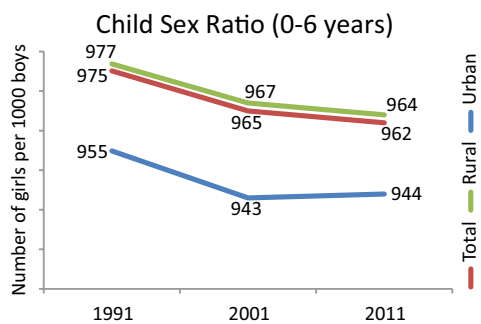
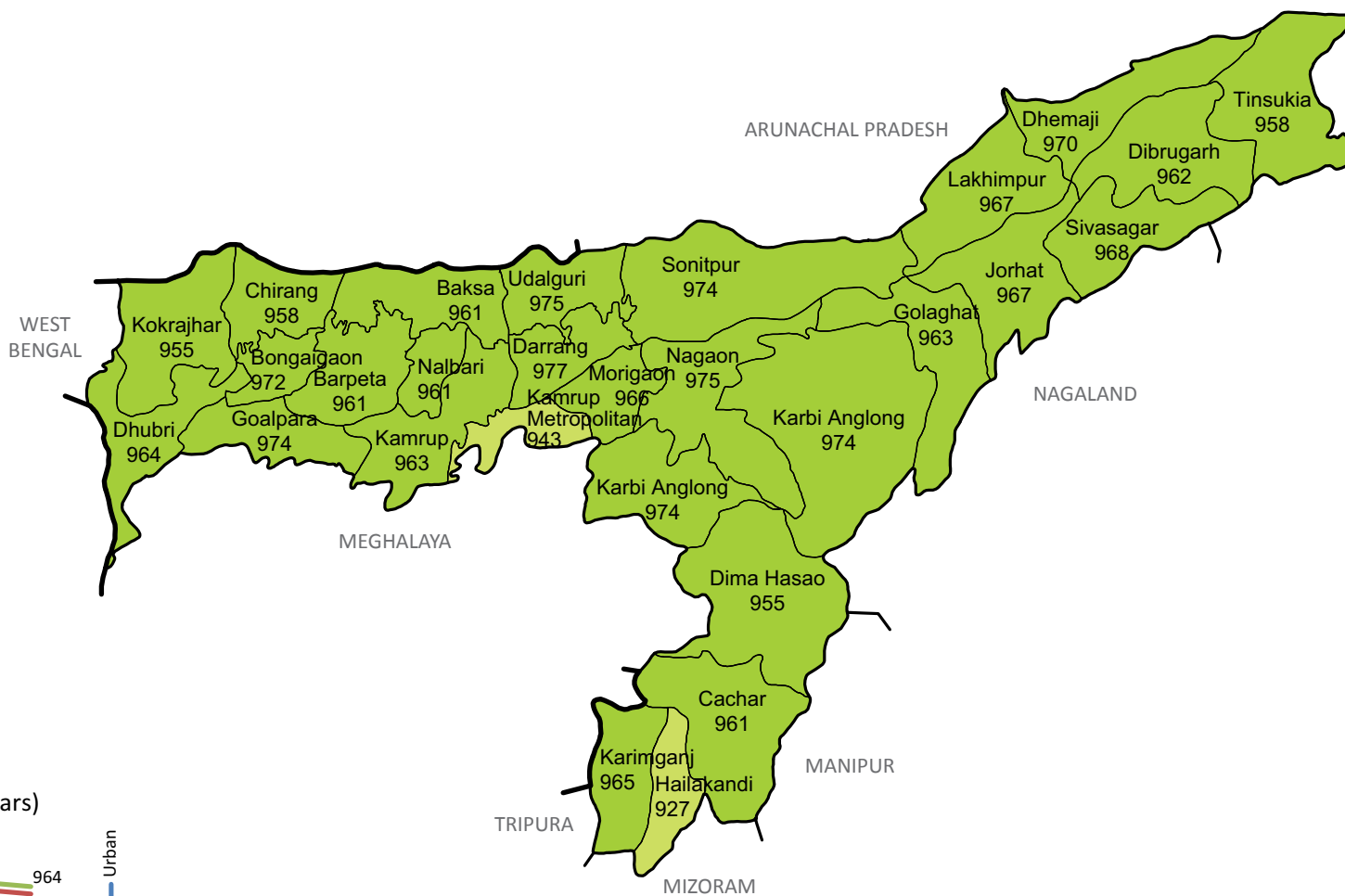


CHILD SEX RATIO



Assam

CSR 965 2001

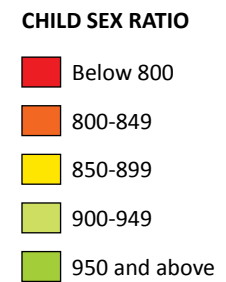
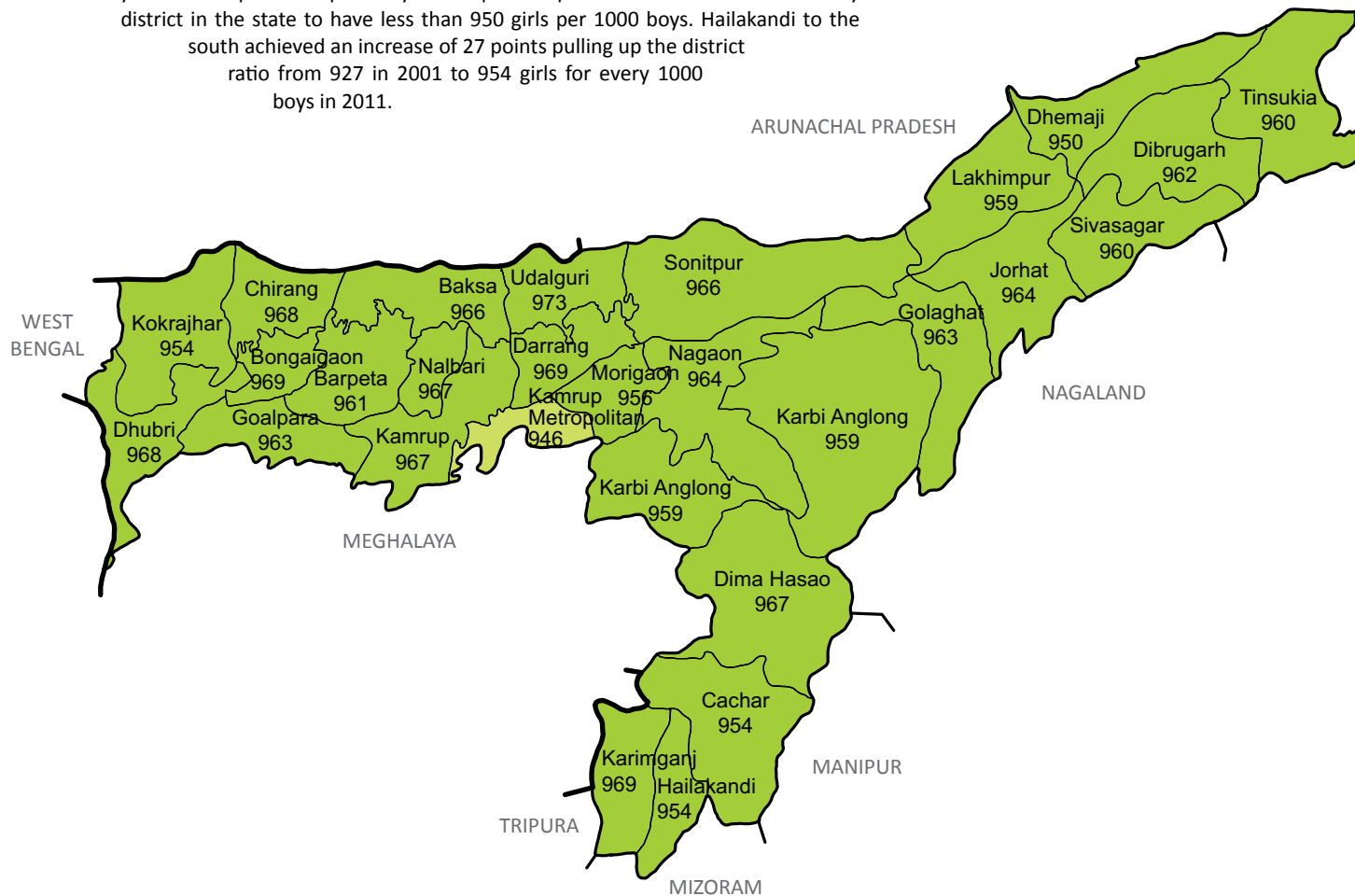


Assam 2011

CSR 962

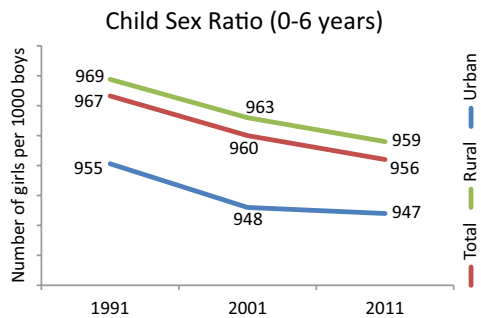
Though above 950, the CSR in Assam dropped from a desirable 975 in 1991 to 962 in 2011. The CSR in urban areas recorded a 1 point increase, continuing to remain below 950, while that in rural areas decreased by 3 points.

Of the total 27 districts in the state, 14 districts showed a decline in CSR. Dhemaji to the east and Karbi Anglong bordering Meghalaya experienced declines in CSR by 20 and 15 points respectively. Kamrup Metropolitan continued to be the only district in the state to have less than 950 girls per 1000 boys. Hailakandi to the south achieved an increase of 27 points pulling up the district ratio from 927 in 2001 to 954 girls for every 1000 boys in 2011.

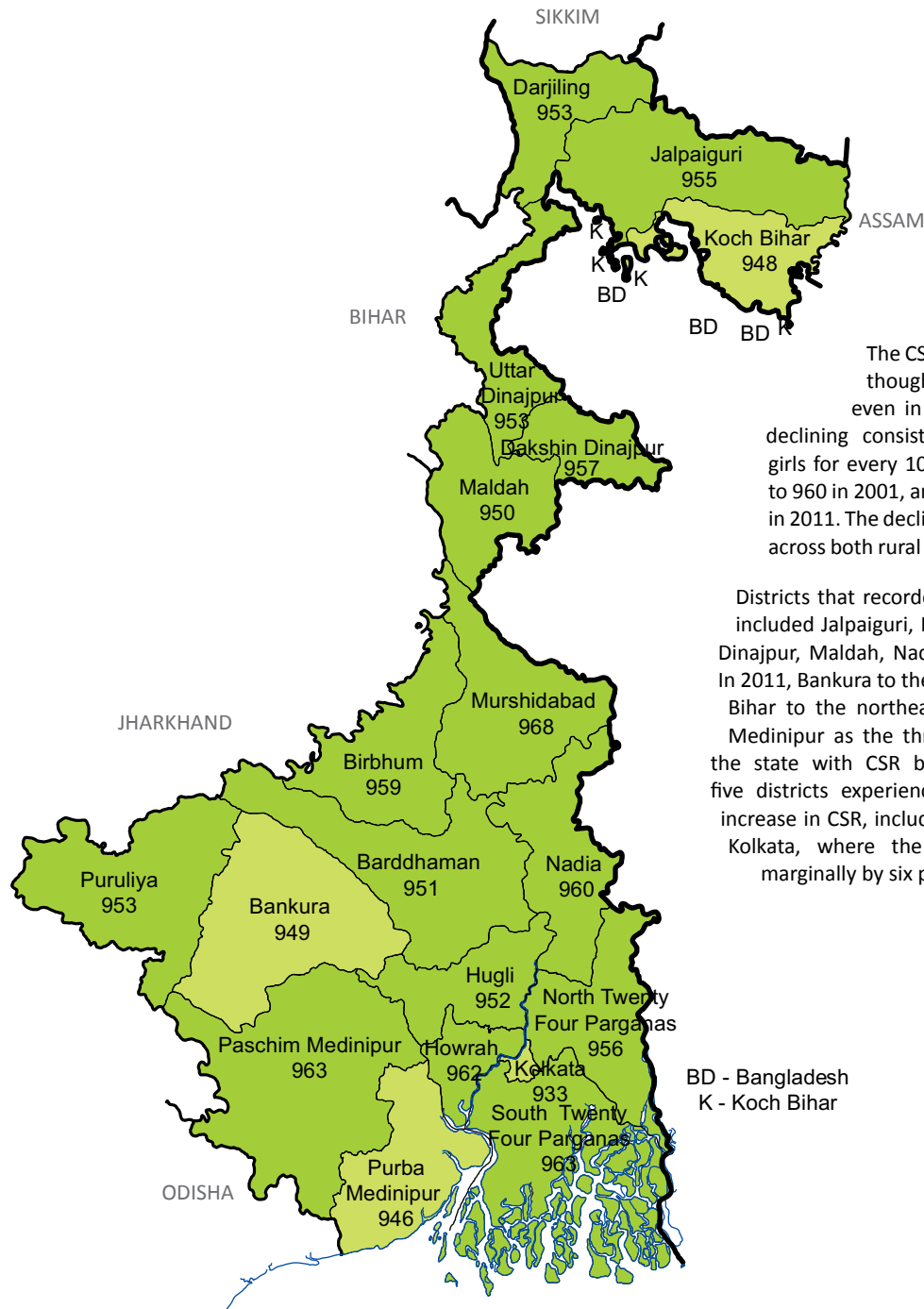


West Bengal

CSR 960 2001



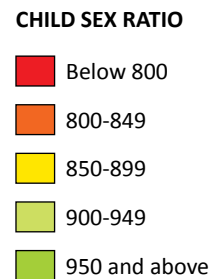
West Bengal CSR 956 2011



The CSR in West Bengal though still above 950 even in 2011, has been declining consistently from 967 girls for every 1000 boys in 1991 to 960 in 2001, and further to 956 in 2011. The decline was observed across both rural and urban areas.

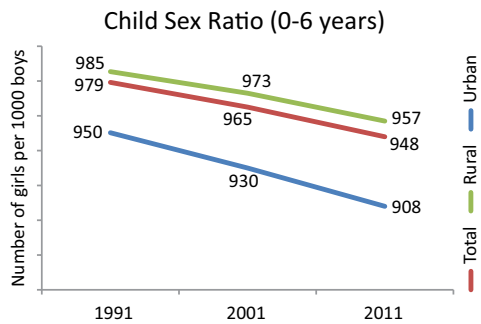
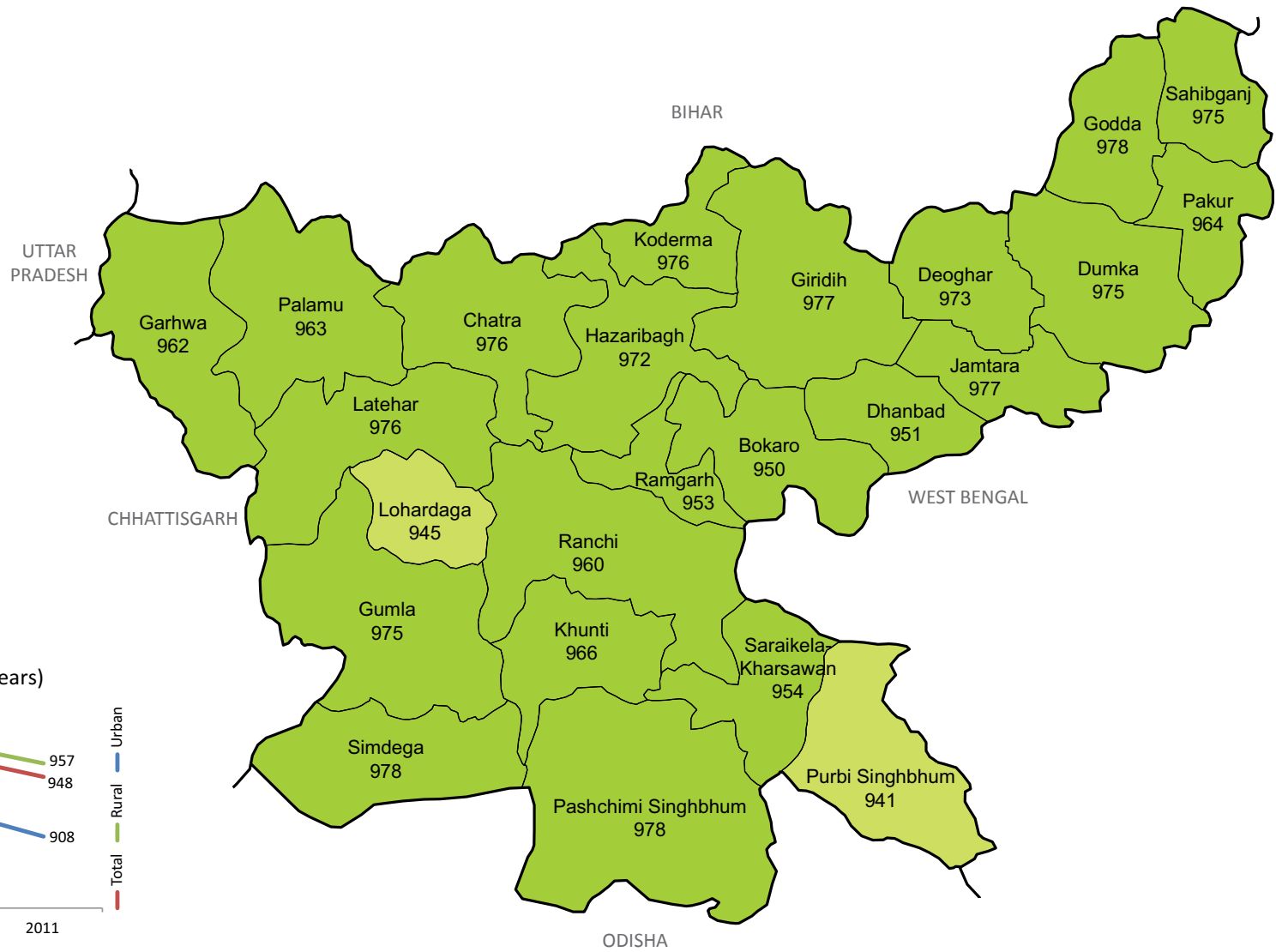
Districts that recorded moderate fall included Jalpaiguri, Koch Bihar, Uttar Dinajpur, Maldah, Nadia and Puruliya. In 2011, Bankura to the south and Koch Bihar to the northeast joined Purba Medinipur as the three hotspots in the state with CSR below 950. Only five districts experienced a negligible increase in CSR, including Howrah and Kolkata, where the CSR increased marginally by six points.

BD - Bangladesh
K - Koch Bihar



Jharkhand

CSR 965 2001



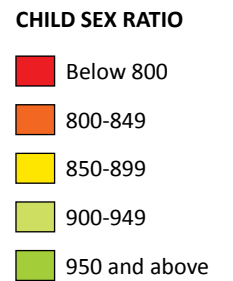
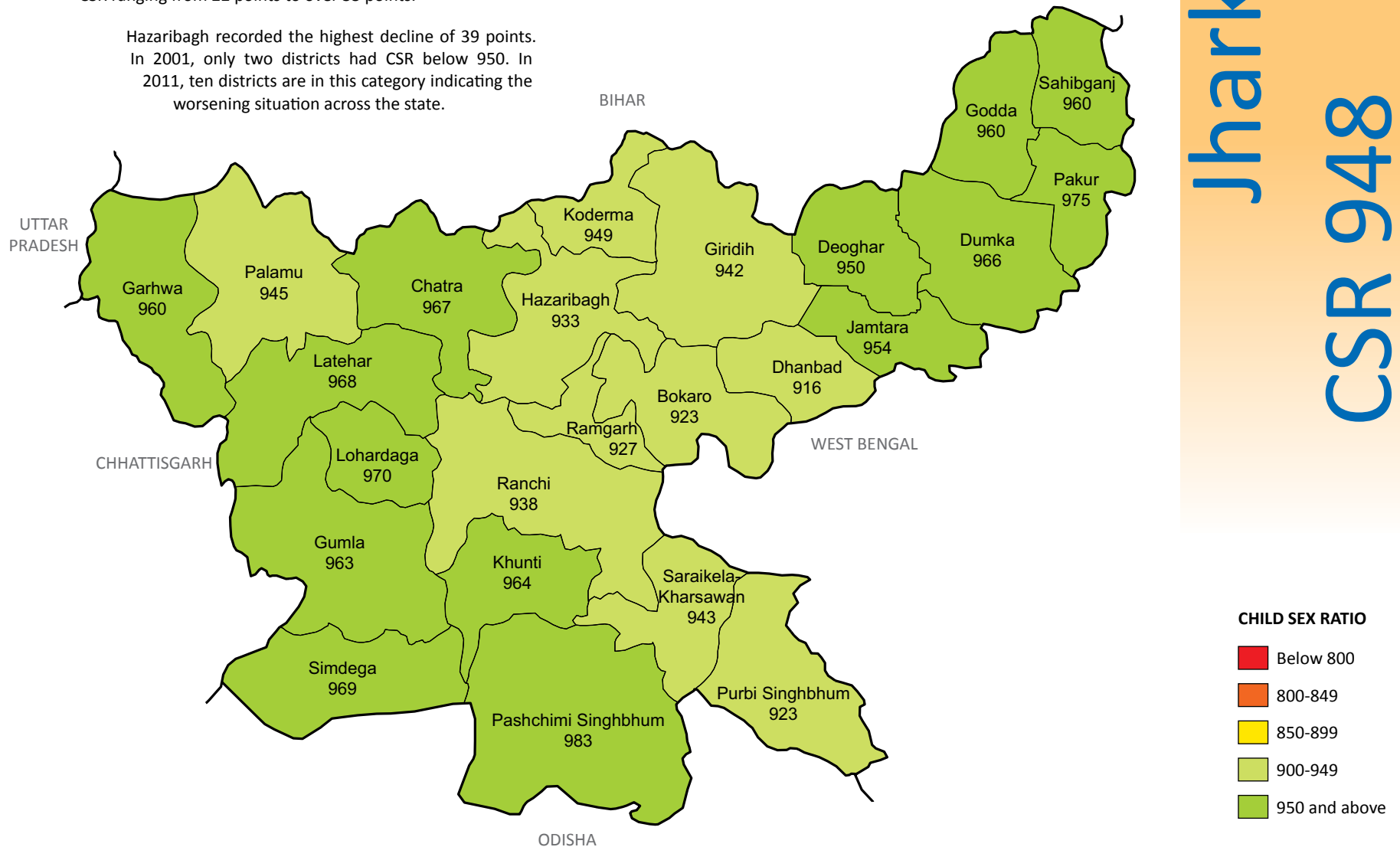
Jharkhand 2011

CSR 948

The CSR in a predominantly tribal Jharkhand dipped from 965 girls to 1000 boys in 2001 to 948 in 2011, dropping below 950 for the first time since 1991 when it was 979. The CSR declined in both rural and urban areas by 16 and 22 points, respectively.

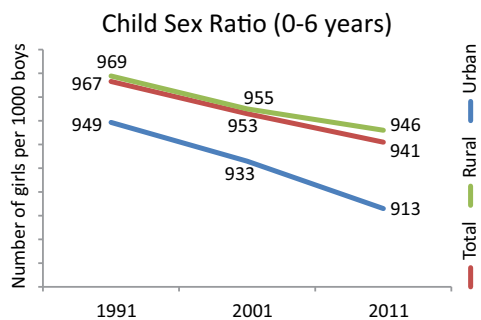
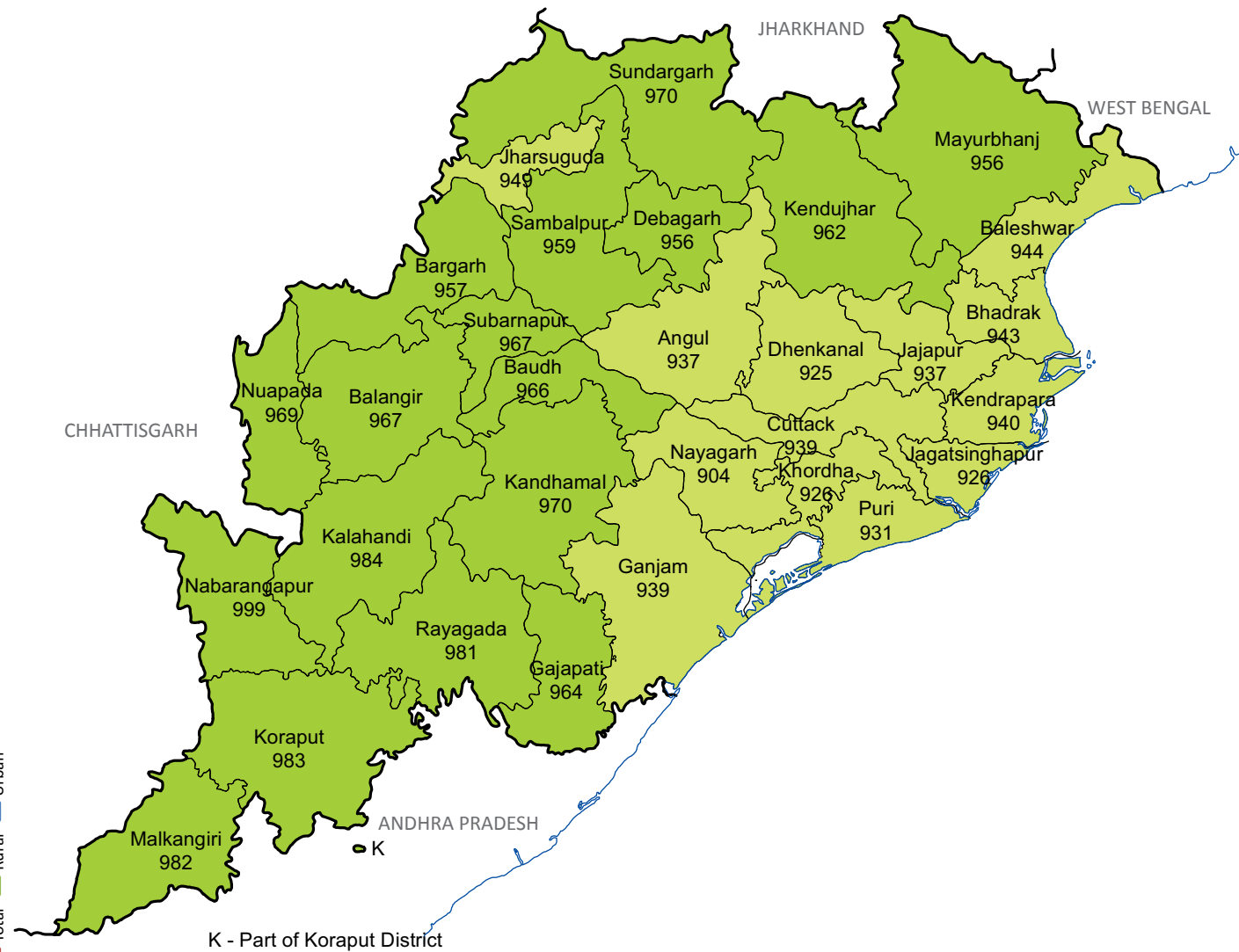
Nearly all 24 districts, except Lohardaga, Pakur and Pashchimi Singhbhum located in three different regions of the state, recorded a decline in CSR. Districts such as Giridih, Dhanbad, Bokaro, Koderma, Hazaribagh and Ramgarh, and the capital Ranchi, lying in a contiguous cluster experienced moderate to sharp fall in CSR ranging from 22 points to over 35 points.

Hazaribagh recorded the highest decline of 39 points. In 2001, only two districts had CSR below 950. In 2011, ten districts are in this category indicating the worsening situation across the state.



Odisha

CSR 953 2001



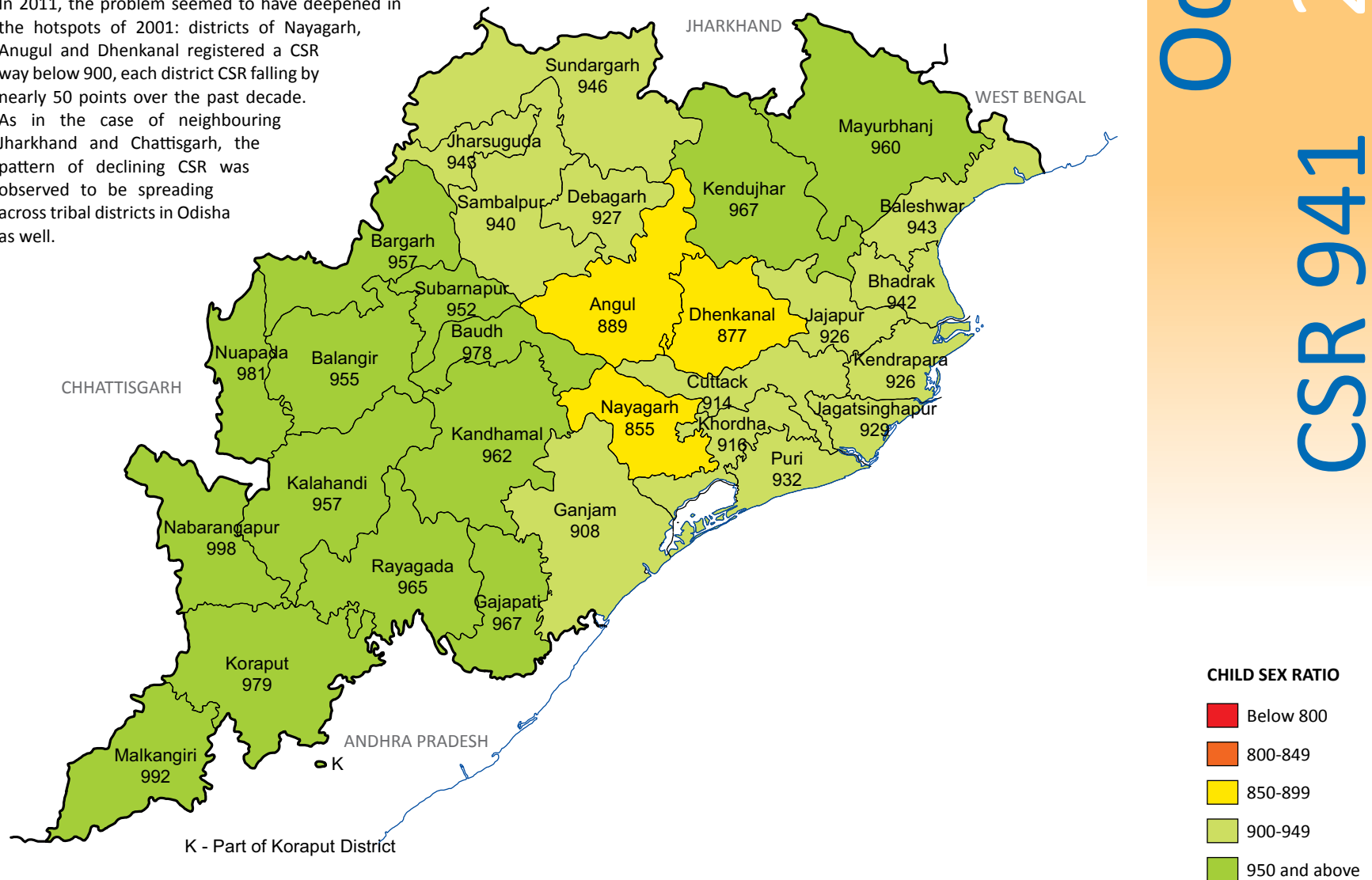
Odisha 2011

CSR 941

The CSR in Odisha declined from 967 girls per 1000 boys in 1991 to 953 in 2001 and finally to 941 in 2011, taking the ratio to below normal levels for the first time. The CSR declined in both rural and urban areas, although urban areas recorded a higher degree of decline of 20 points.

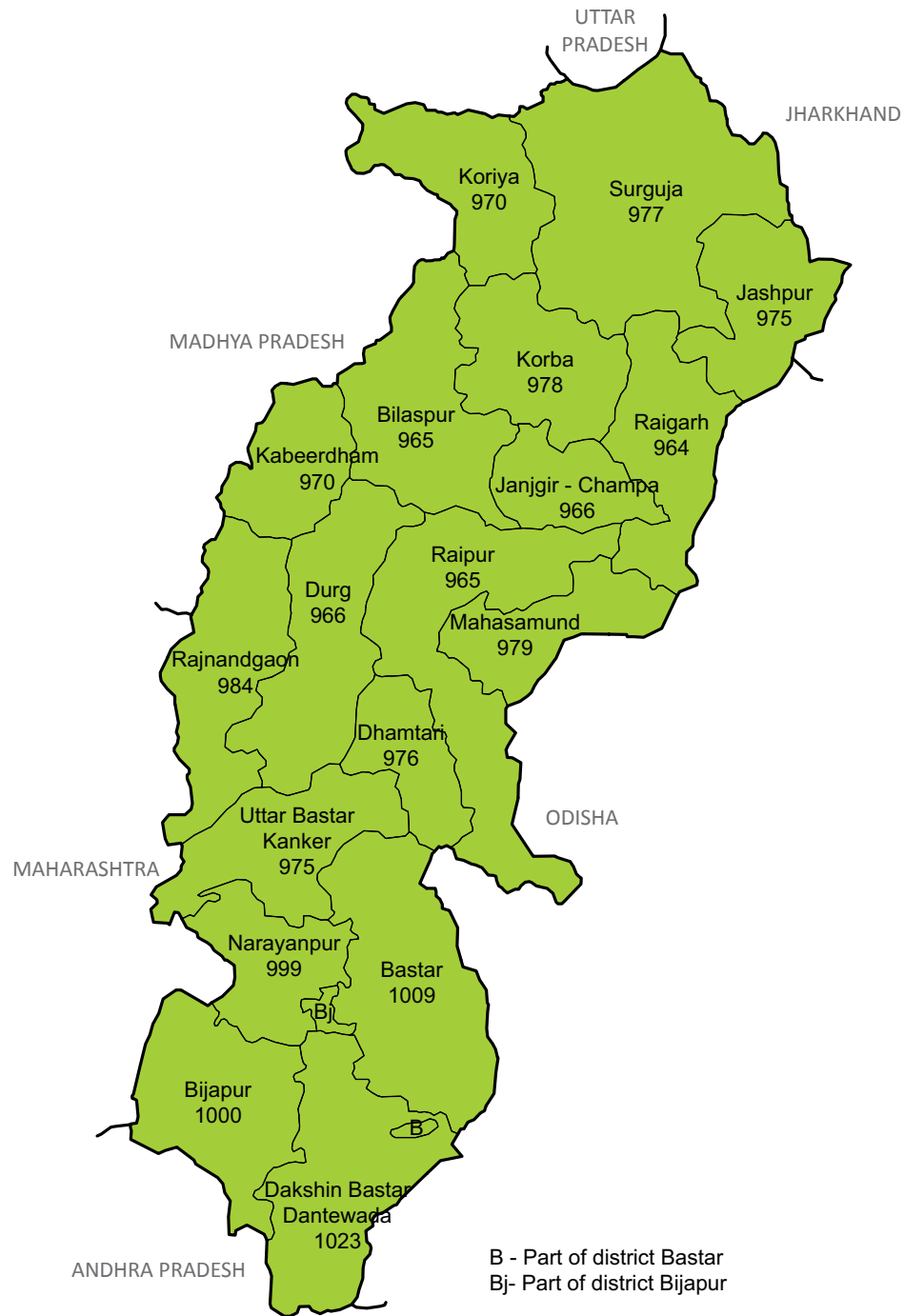
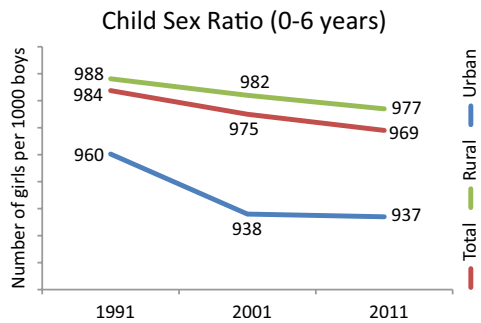
In 2011 the problem no longer remained limited to coastal districts alone as was the case in 2001. Other districts that reflected sharp drops in 2011 CSR included Debagarh, Sambalpur, Sundargarh in the north, Cuttack in the east and Kalahandi, Rayagada and Ganjam, in the south.

In 2011, the problem seemed to have deepened in the hotspots of 2001: districts of Nayagarh, Anugul and Dhenkanal registered a CSR way below 900, each district CSR falling by nearly 50 points over the past decade. As in the case of neighbouring Jharkhand and Chattisgarh, the pattern of declining CSR was observed to be spreading across tribal districts in Odisha as well.

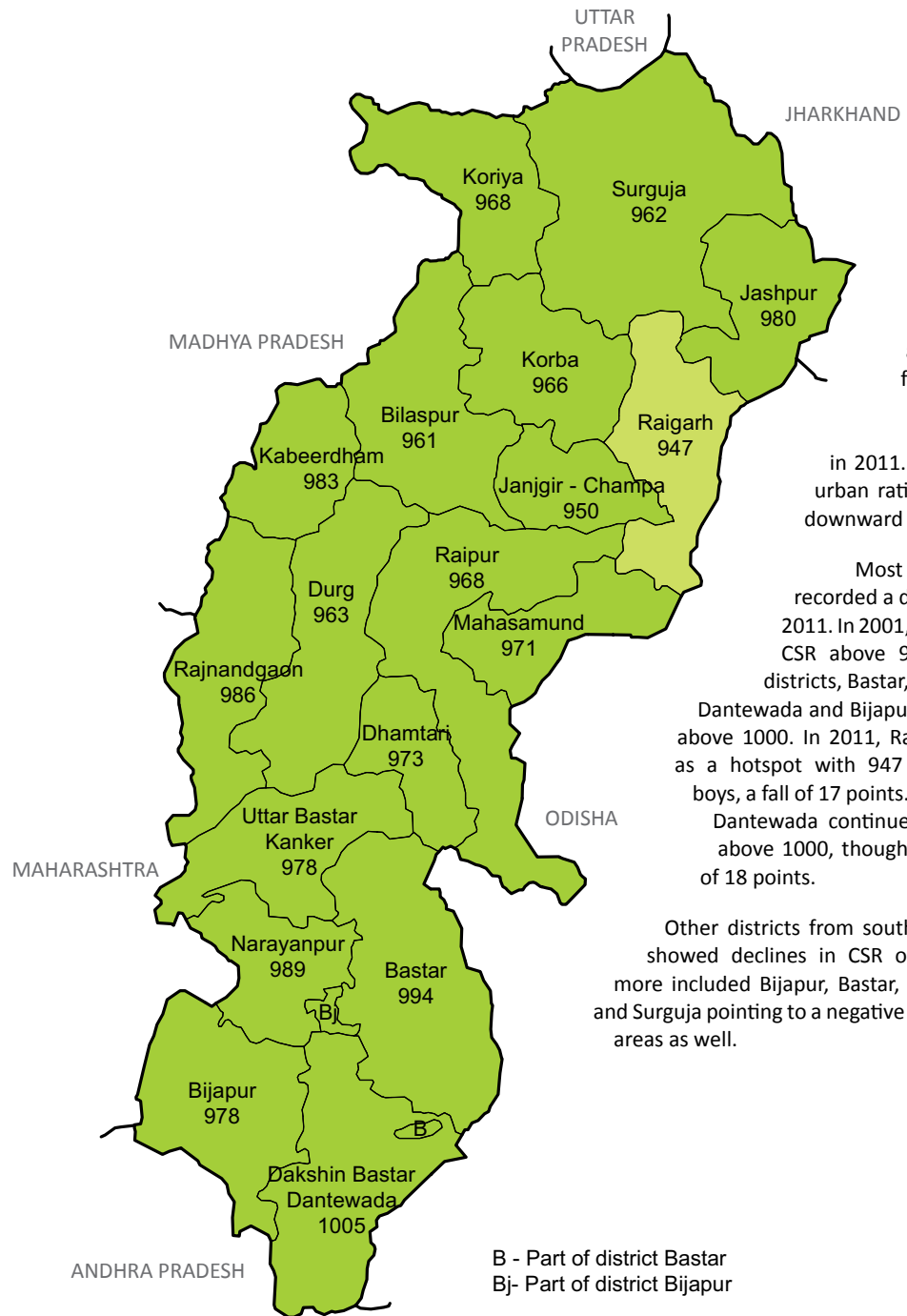


Chhattisgarh

CSR 975 2001



Chhattisgarh CSR 969 2011

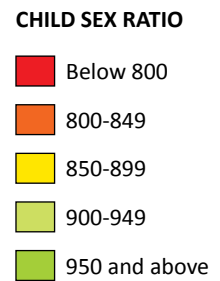


Chhattisgarh experienced a decline in CSR from 975 girls per 1000 boys in 2001 to 969 in 2011. Both rural and urban ratios registered a downward slide.

Most of the districts recorded a decline in CSR in 2011. In 2001, all districts had CSR above 950 with three districts, Bastar, Dakshin Bastar Dantewada and Bijapur recording CSR above 1000. In 2011, Raigarh emerged as a hotspot with 947 girls for 1000 boys, a fall of 17 points. Dakshin Bastar Dantewada continued to have CSR above 1000, though with a decline of 18 points.

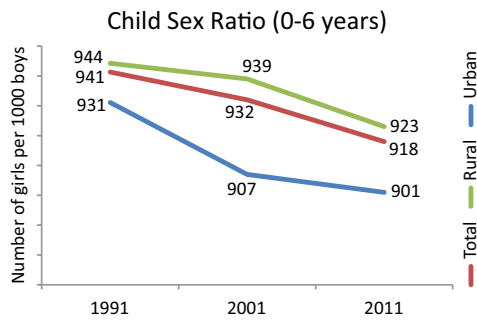
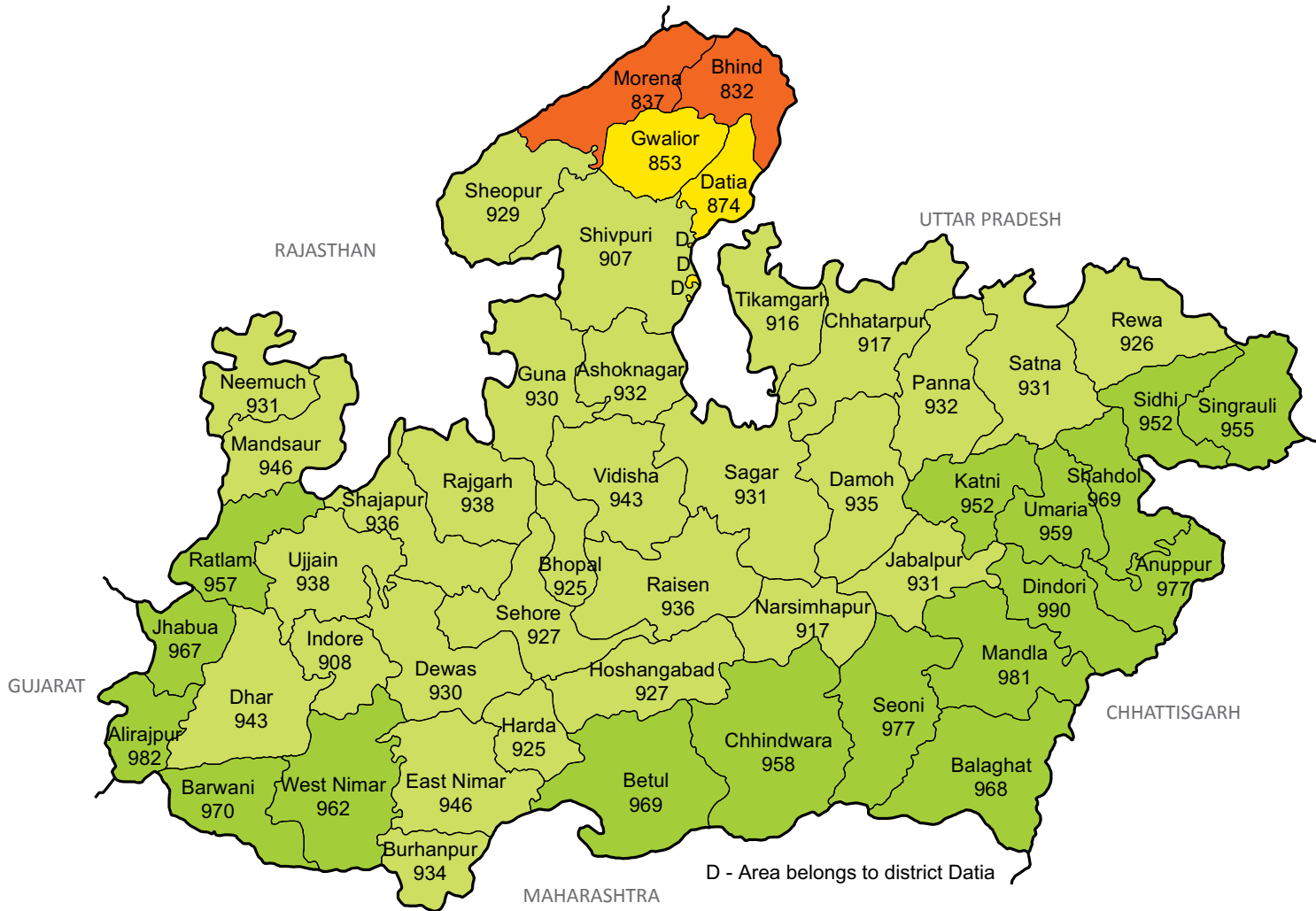
Other districts from south to north that showed declines in CSR of 15 points or more included Bijapur, Bastar, Janjgir-Champa and Surguja pointing to a negative change in tribal areas as well.

B - Part of district Bastar
Bj- Part of district Bijapur

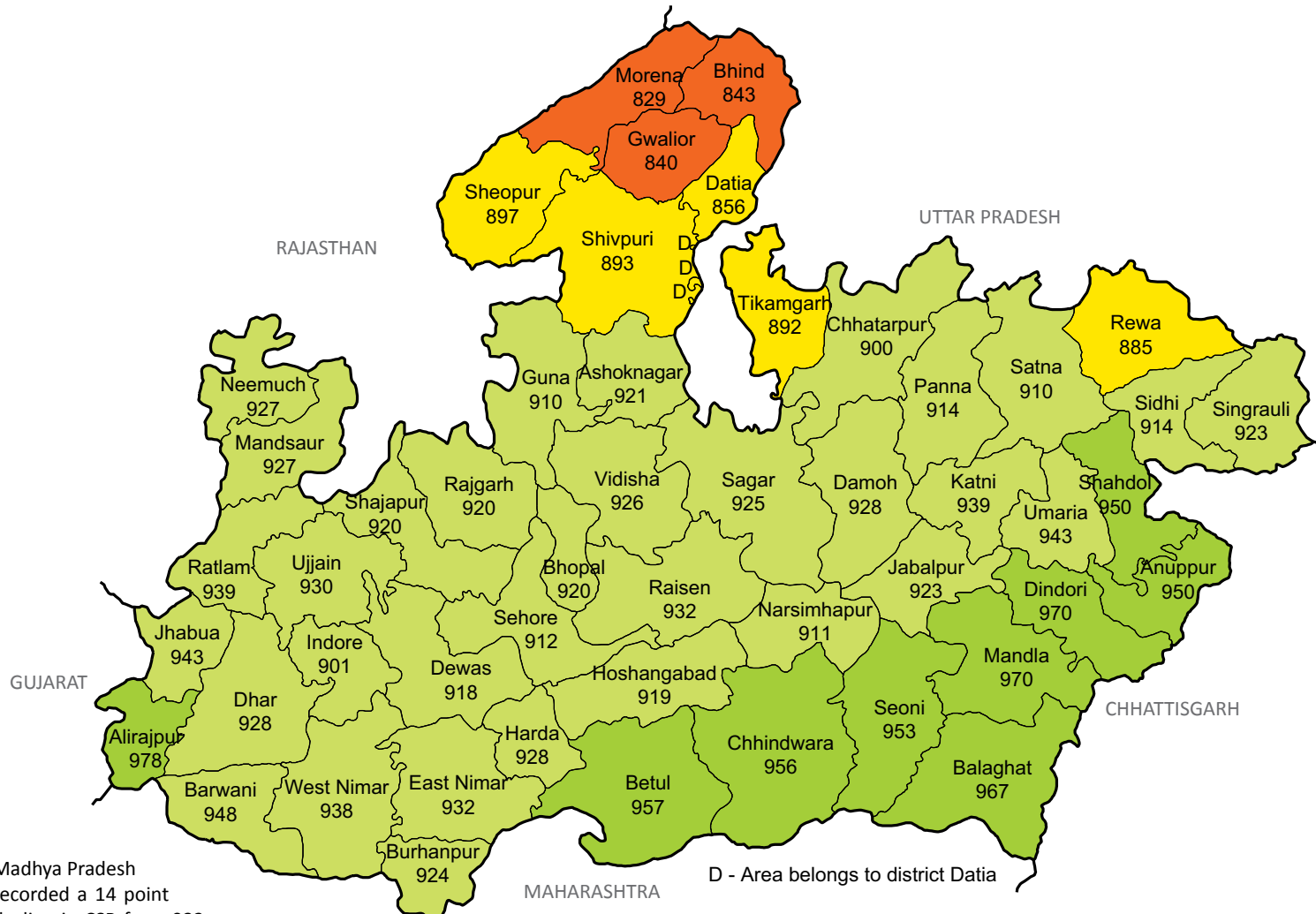


Madhya Pradesh

CSR 932 2001



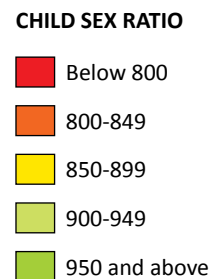
Madhya Pradesh CSR 918 2011



Madhya Pradesh recorded a 14 point decline in CSR from 932 girls per 1000 boys in 2001 to 918 in 2011. The CSR declined in both rural and urban areas with rural CSR recording a higher degree of decline of 16 points.

Nearly all districts, recorded a decline in CSR with Rewa recording the highest decline of 41 points from 926 in 2001 to 885 in 2011 and emerging as a new hotspot in the east. Bhind is the only district that showed a modest 11 point increase in CSR, yet continuing to be in the 'red' zone with CSR of 843. A contiguous spread is visible in the north starting from the 2001 hotspots of Bhind and Morena moving further inward to Gwalior, Sheopur, Shivpuri, Datia and Tikamgarh. A similar pattern is seen in the south-west with diffusion of the problem from the 2001 hotspot of Dhar to neighbouring districts of Ratlam, Jhabua, Barwani and West Nimar with the exception of Alirajpur. The prosperous district of Indore also registered a further fall in CSR reaching 901 in 2011.

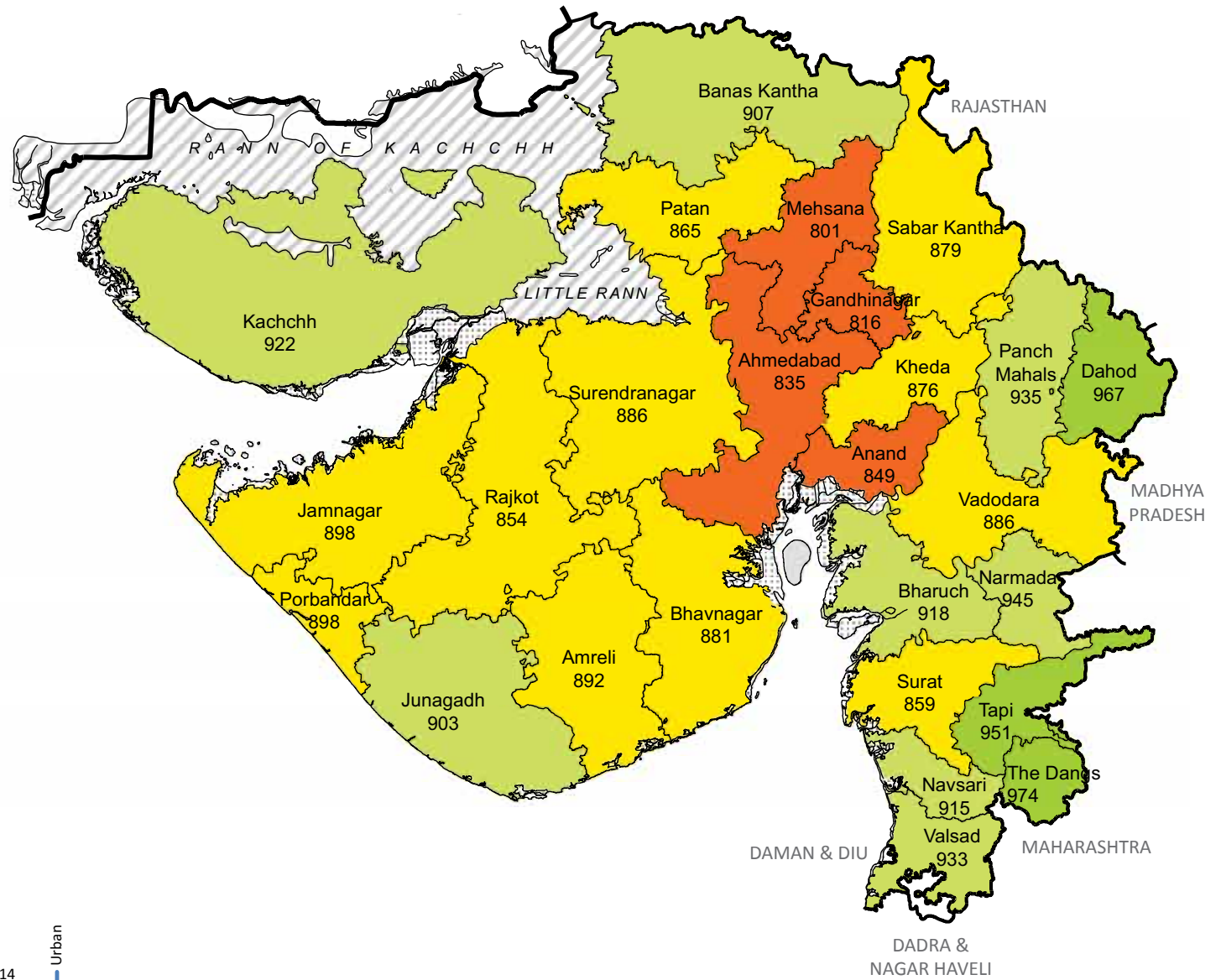
In 2001, 17 districts out of the total 50 districts were in the 'dark green' with CSR above 950. Most of these were tribal districts bordering Rajasthan, Gujarat, Maharashtra and Chhattisgarh. In 2011, only 9 districts, remained in this zone, with the phenomenon of declining CSR engulfing tribal areas and almost the whole state.



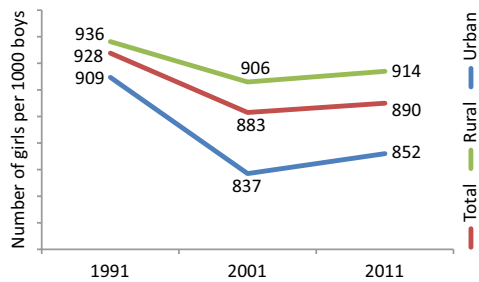
Gujarat

2001

CSR 883

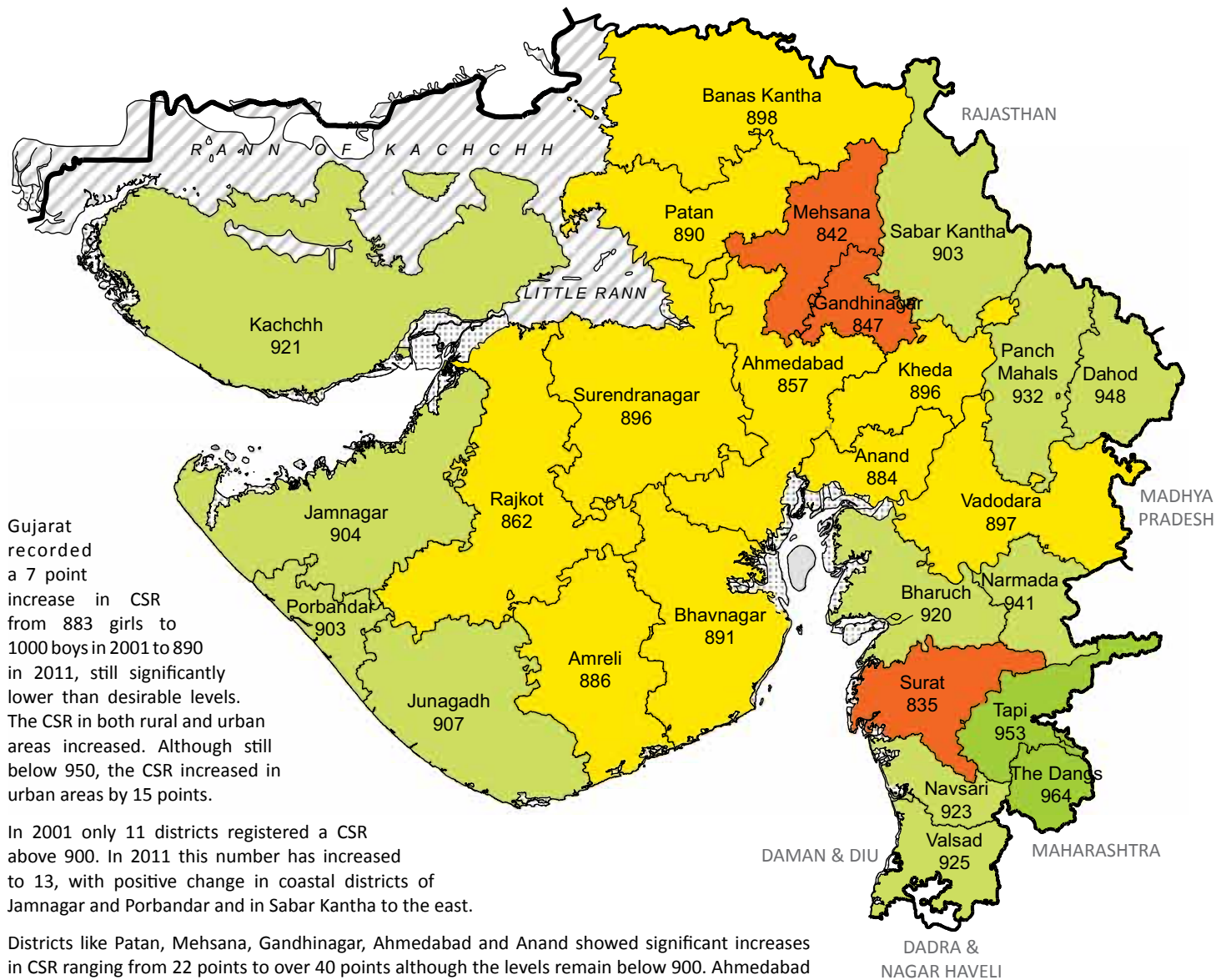


Child Sex Ratio (0-6 years)



Gujarat 2011

CSR 890

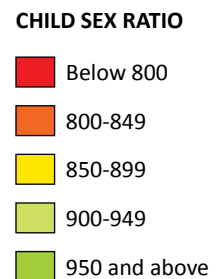


Gujarat recorded a 7 point increase in CSR from 883 girls to 1000 boys in 2001 to 890 in 2011, still significantly lower than desirable levels. The CSR in both rural and urban areas increased. Although still below 950, the CSR increased in urban areas by 15 points.

In 2001 only 11 districts registered a CSR above 900. In 2011 this number has increased to 13, with positive change in coastal districts of Jamnagar and Porbandar and in Sabar Kantha to the east.

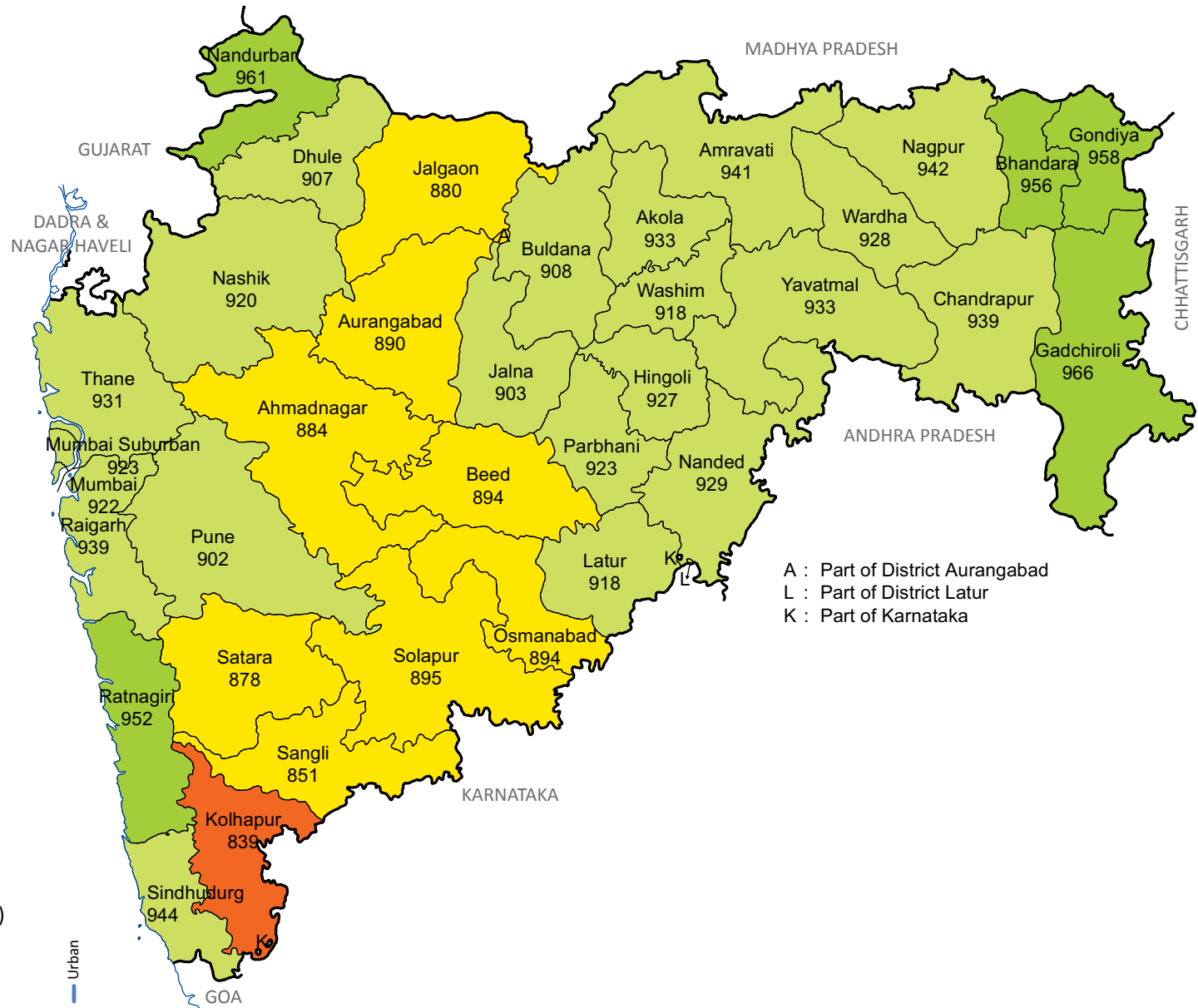
Districts like Patan, Mehsana, Gandhinagar, Ahmedabad and Anand showed significant increases in CSR ranging from 22 points to over 40 points although the levels remain below 900. Ahmedabad and Anand have come out of the 'red zone' with a CSR above 850. However, Surat is now a hotspot registering a fall in CSR by 24 points reaching 835 girls per 1000 boys in 2011.

Notably, a majority of the tribal districts like Panch Mahals, Dahod, the Dangs and Valsad, bordering Madhya Pradesh and Maharashtra, experienced a decline in CSR from 2001 levels, with Dahod recording a fall of 19 points.

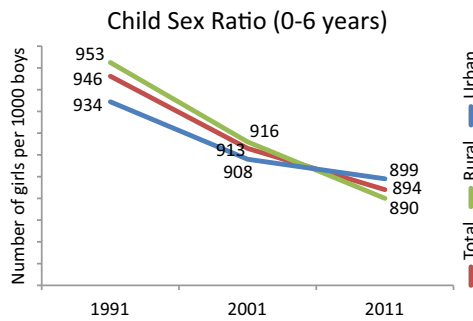


Maharashtra

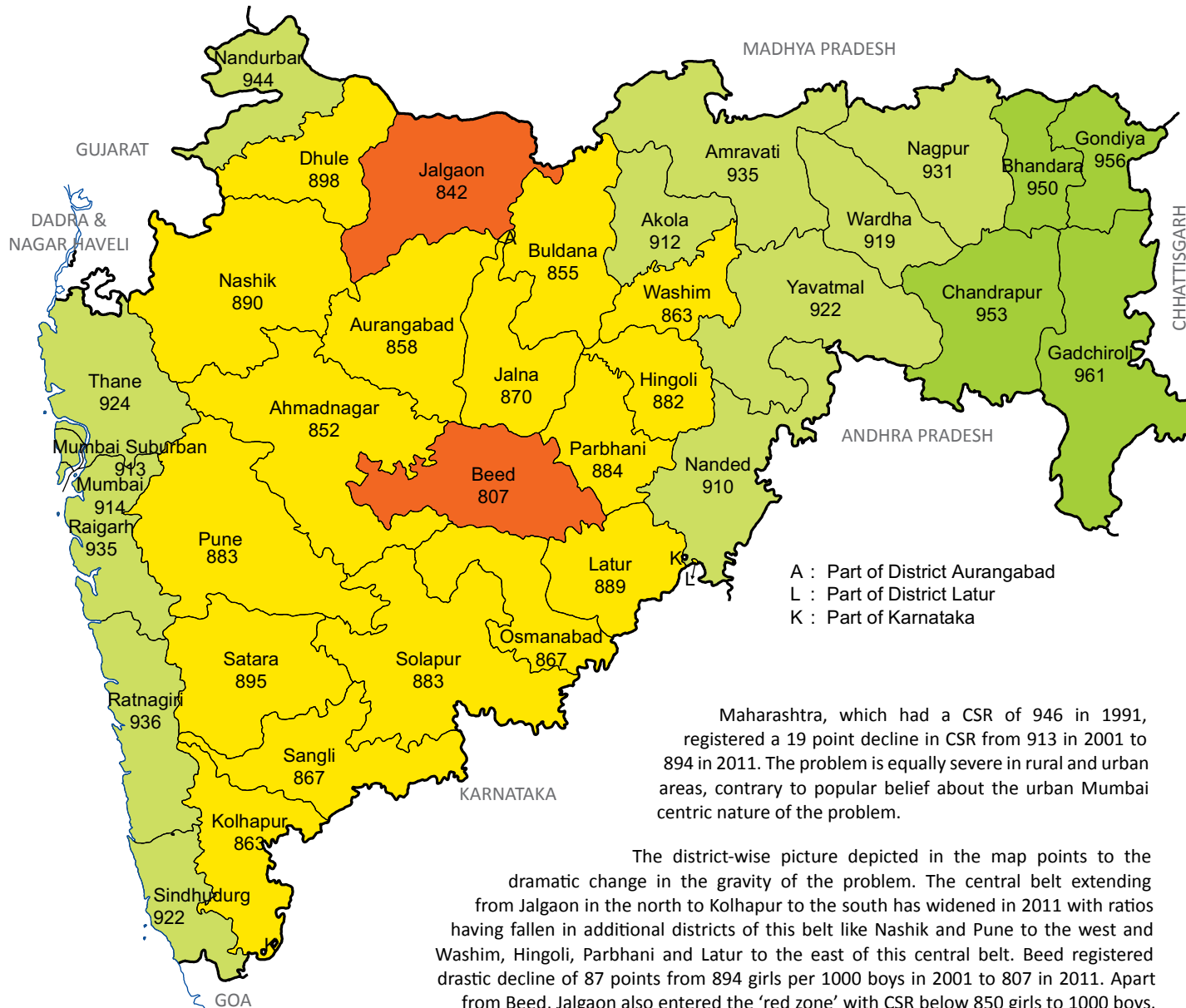
CSR 913 2001



A : Part of District Aurangabad
 L : Part of District Latur
 K : Part of Karnataka

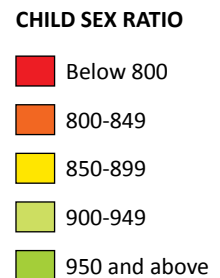


Maharashtra CSR 894 2011



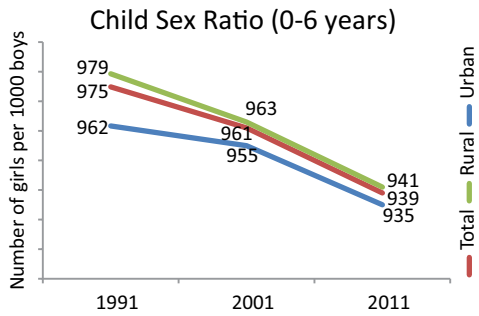
Maharashtra, which had a CSR of 946 in 1991, registered a 19 point decline in CSR from 913 in 2001 to 894 in 2011. The problem is equally severe in rural and urban areas, contrary to popular belief about the urban Mumbai centric nature of the problem.

The district-wise picture depicted in the map points to the dramatic change in the gravity of the problem. The central belt extending from Jalgaon in the north to Kolhapur to the south has widened in 2011 with ratios having fallen in additional districts of this belt like Nashik and Pune to the west and Washim, Hingoli, Parbhani and Latur to the east of this central belt. Beed registered drastic decline of 87 points from 894 girls per 1000 boys in 2001 to 807 in 2011. Apart from Beed, Jalgaon also entered the 'red zone' with CSR below 850 girls to 1000 boys. The CSR in almost all districts is now below 950, with most districts entering the range of 850-900. The only exceptions are the remote eastern tribal districts of Gondiya, Gadchiroli, and Chandrapur, where the CSR is equal to 950 or more. Chandrapur in the east, and the cluster of Satara, Sangli and Kolhapur in the south, were the only districts that registered an increase in CSR in the last decade.



Andhra Pradesh

CSR 961 2001



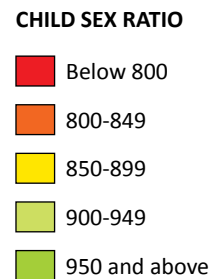
Andhra Pradesh

CSR 939 2011



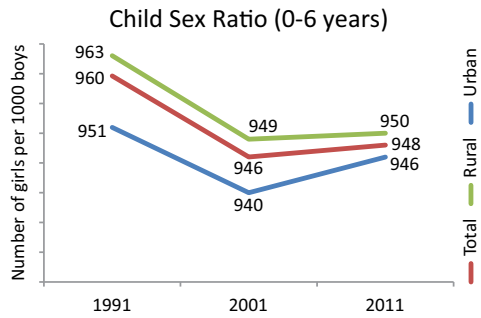
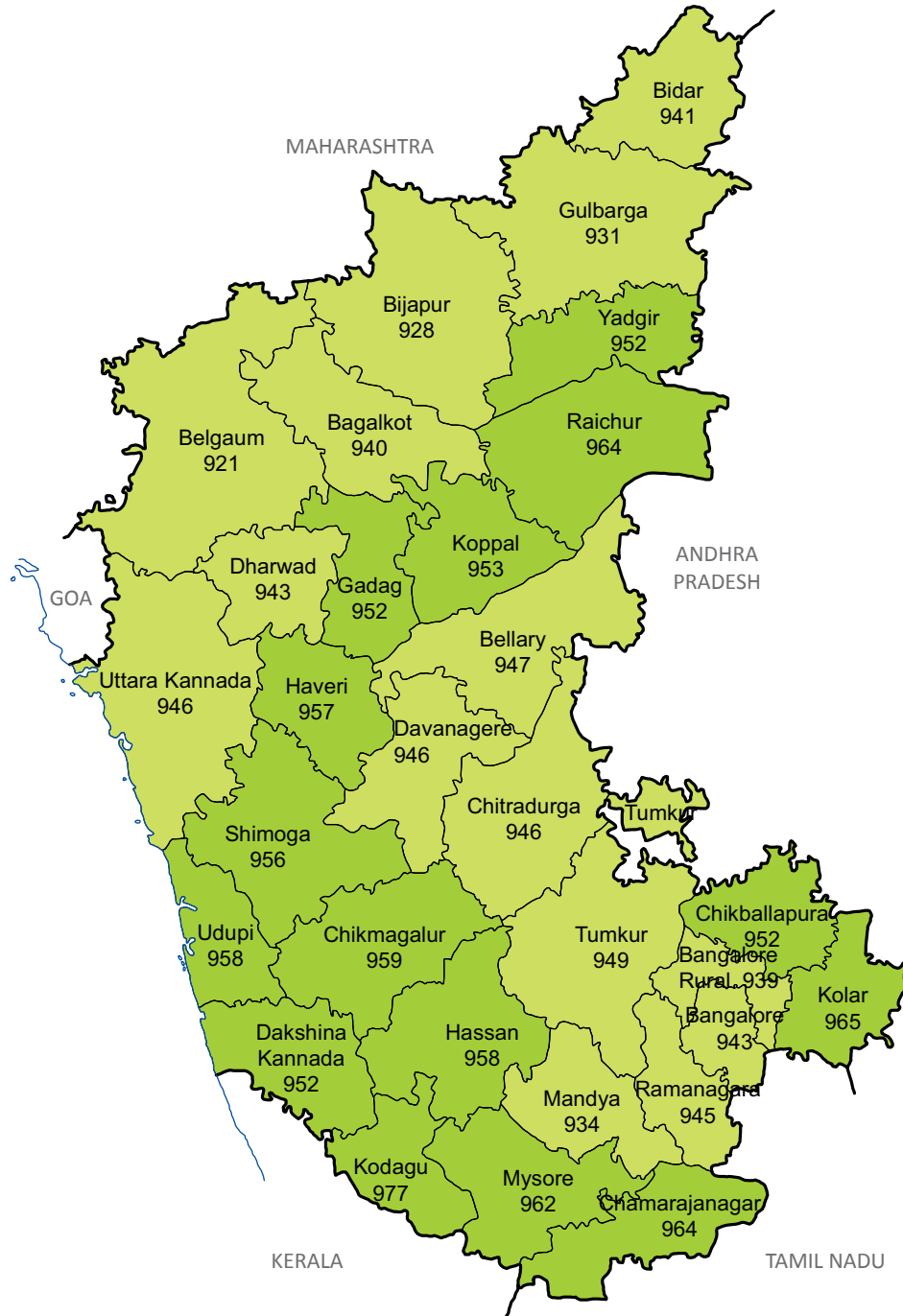
Though the CSR in Andhra is not as low as that in the northwestern states, it has consistently declined from 975 in 1991 to 939 in 2011. Both rural and urban ratios have registered a downward slide to below 950.

In 2001, except for Hyderabad, the rest of Andhra portrayed a normal picture. However, in 2011 the change in colour from dark to light green is dramatic. Except for Medak in the west and the cluster of districts ranging from Khammam to Srikakulam in the east, all districts registered ratios below 950, pulling the state average down to 939 girls for every 1000 boys. Given the rapid diffusion of the problem to both well-off and not so prosperous districts over the last decade, the scenario does point to the need for urgent action.



Karnataka

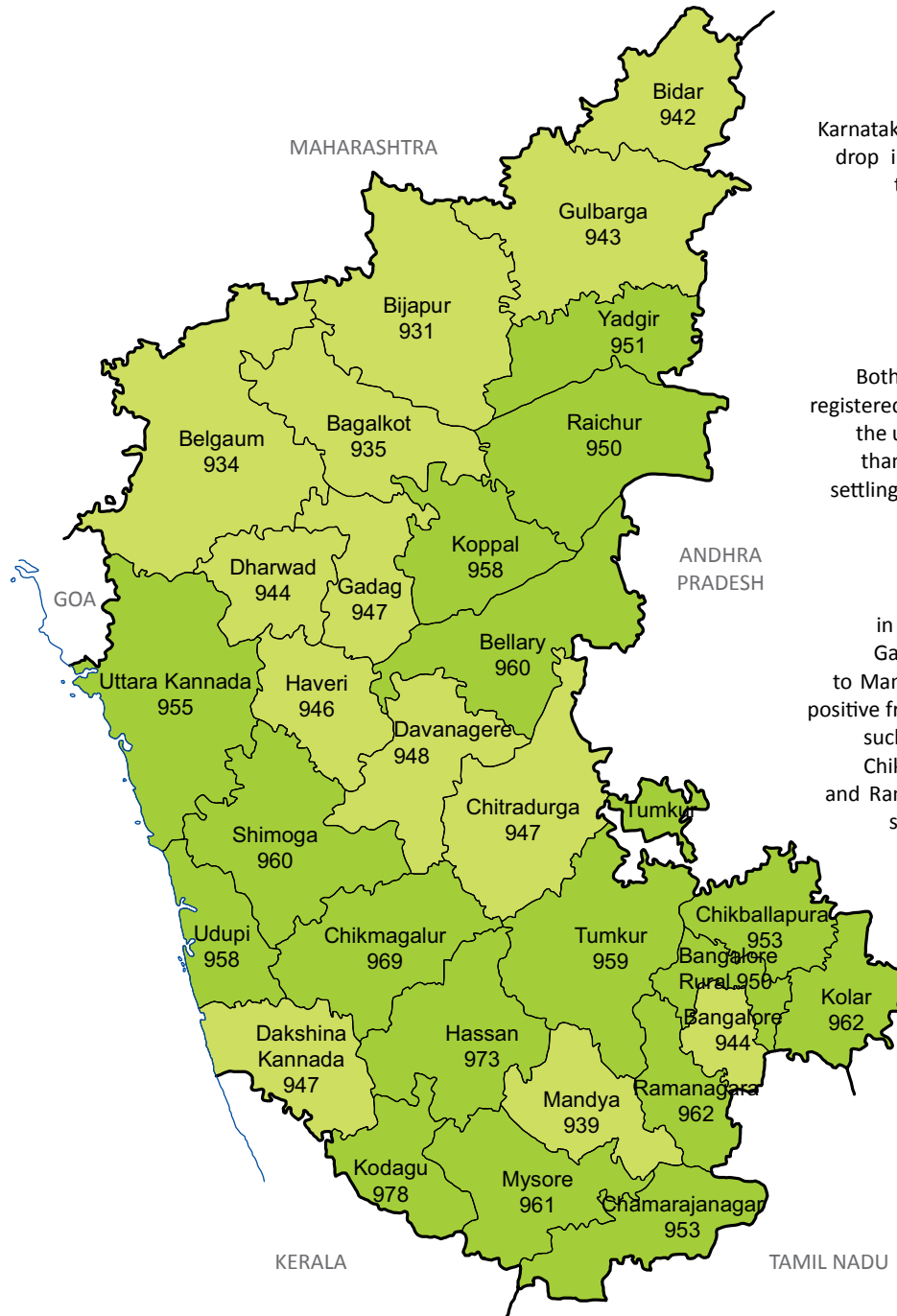
CSR 946 2001



Karnataka

CSR 948

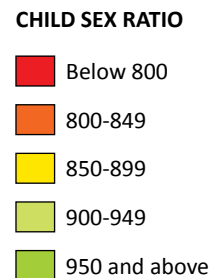
2011



Karnataka recorded a moderate drop in CSR from 960 in 1991 to 946 in 2001. The CSR increased thereafter by a marginal 2 points over the next decade reaching 948 in 2011.

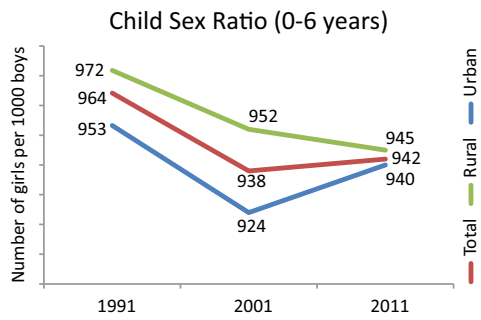
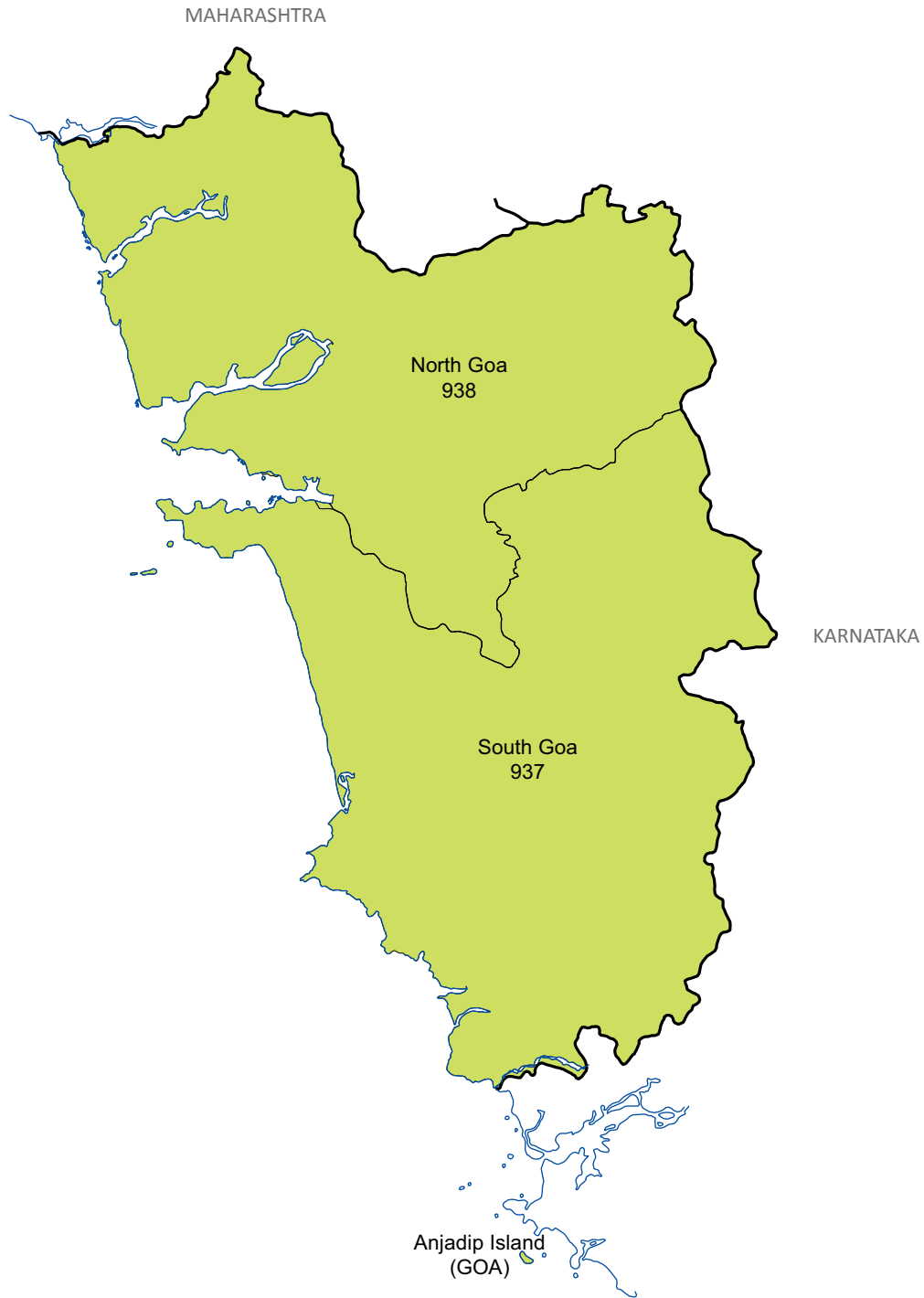
Both rural and urban CSR registered a marginal increase with the urban CSR increasing more than rural CSR, both ratios settling around 950.

The pattern of adverse CSR stretches from Bidar and Gulbarga in the north across central Gadag, Haveri, further down to Mandya in the south. On the positive front, ratios in few districts such as Belgaum, Bellary, Chikmagalur, Hassan, Tumkur and Ramanagara have increased substantially over the 2001 levels. Bangalore Rural CSR has increased to 950 while Bangalore district continues to be at 944. Bijapur registered the lowest CSR in the state at 931 girls for every 1000 boys.

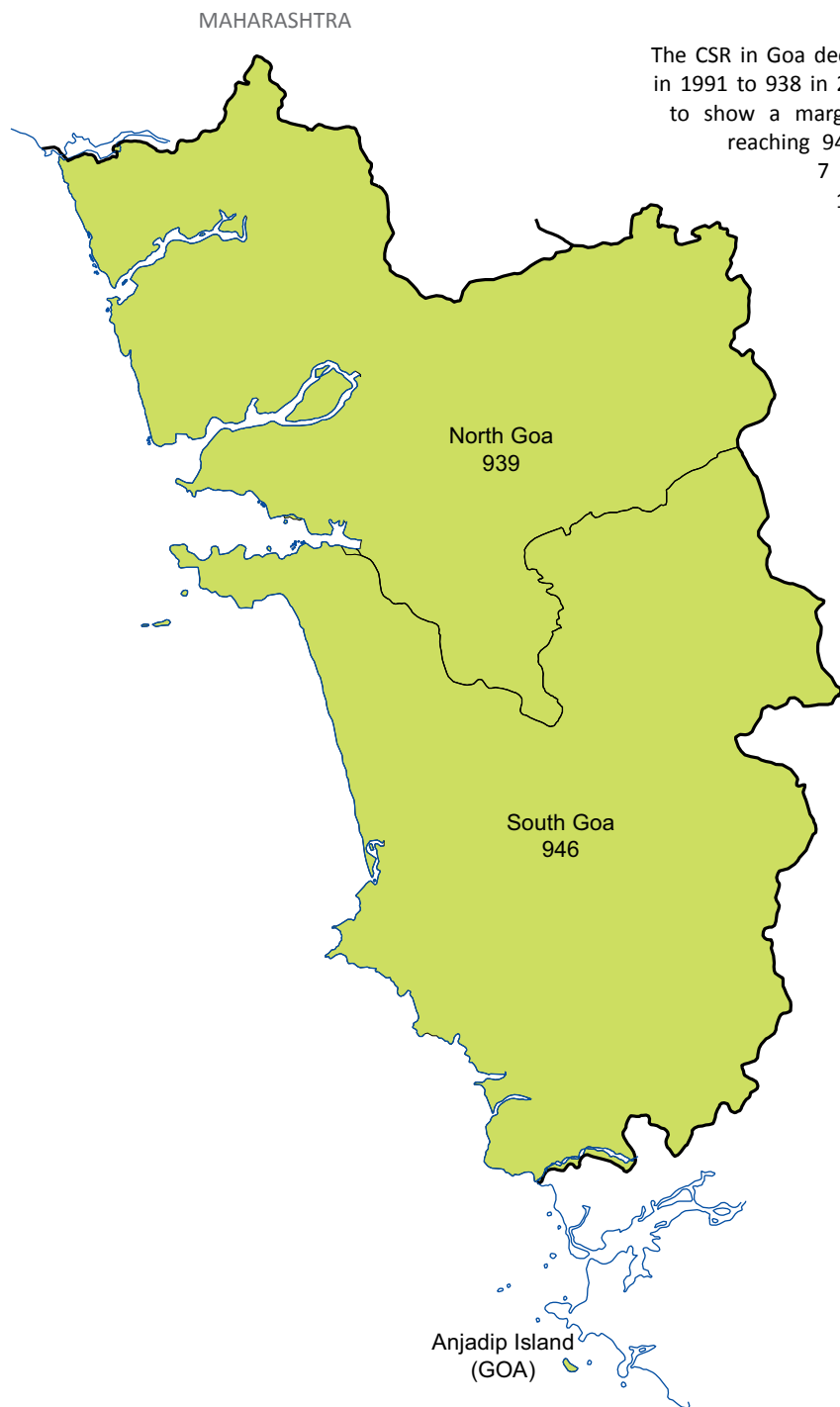


Goa

CSR 938 2001



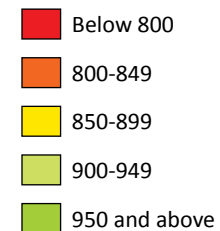
Goa 2011 CSR 942



The CSR in Goa declined from 964 girls per 1000 boys in 1991 to 938 in 2001. The trend reversed thereafter to show a marginal increase in CSR by 4 points reaching 942 in 2011. Rural CSR declined by 7 points and urban CSR increased by 16 points, but both continued to be below 950.

The CSR in both North and South Goa increased in 2011, but while the CSR in North Goa, bordering Maharashtra increased by only one point to reach 939, the CSR in South Goa climbed up by nine points reaching 946.

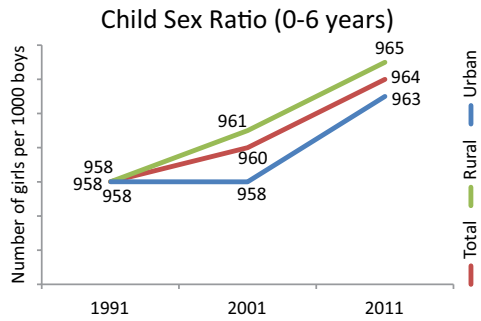
CHILD SEX RATIO



Kerala

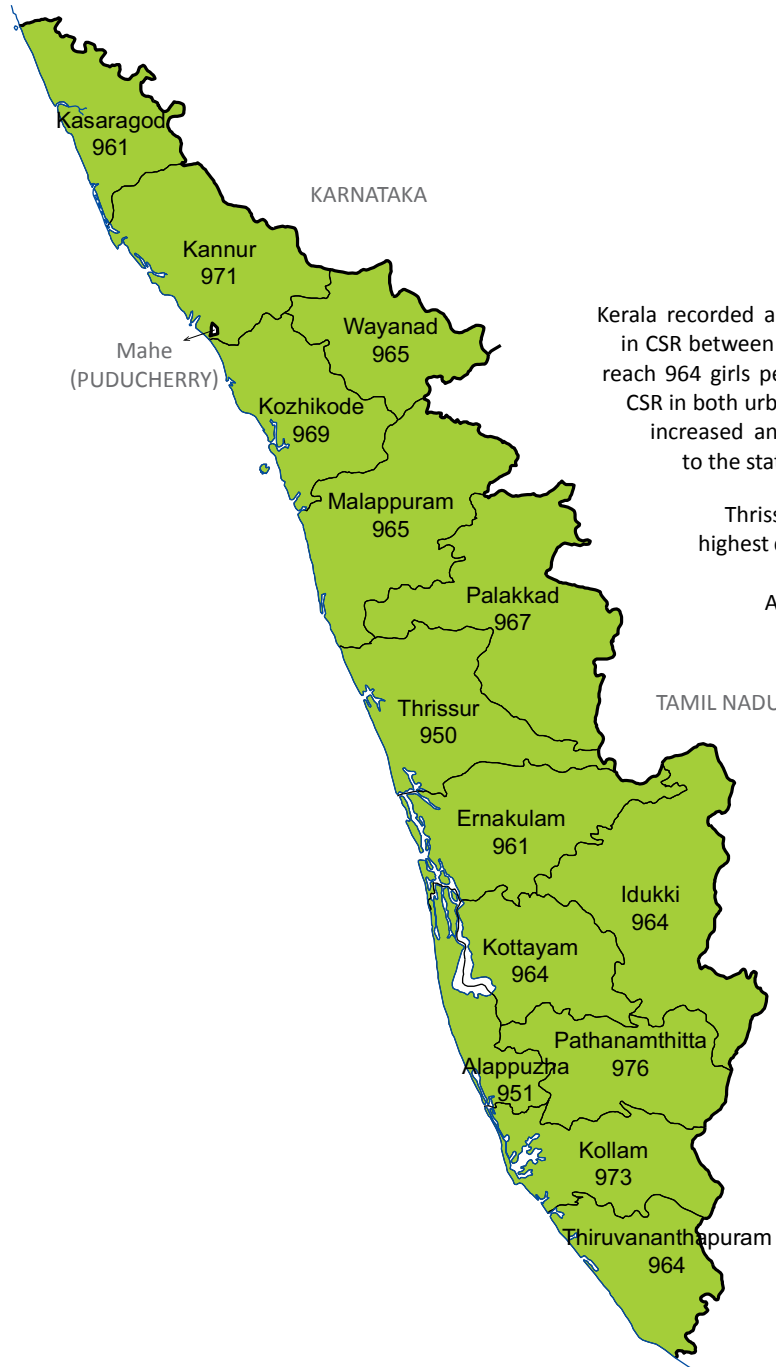
2001

CSR 960



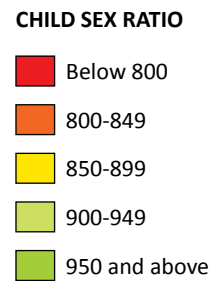
Kerala 2011

CSR 964



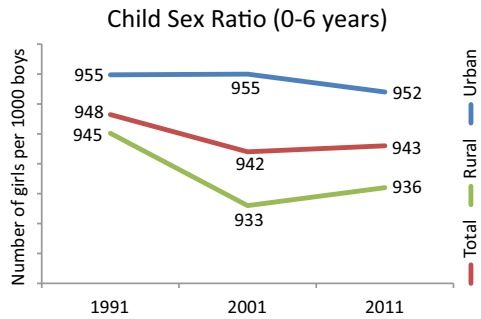
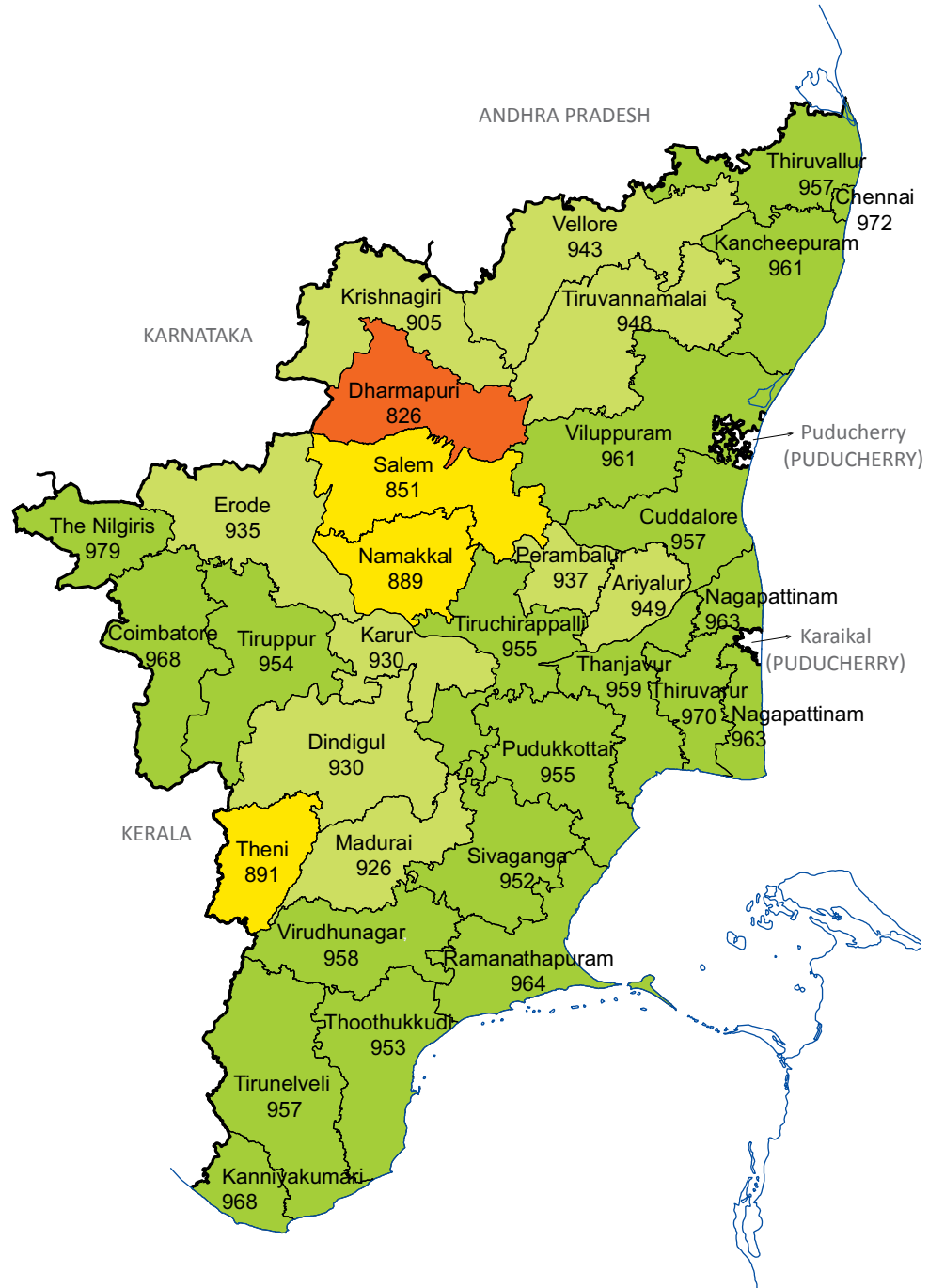
Kerala recorded a 4 point increase in CSR between 2001 and 2011 to reach 964 girls per 1000 boys. The CSR in both urban and rural areas increased and remained close to the state average of 964.

Thrissur recorded the highest decline by 8 points while Idukki and Alappuzha declined marginally by 5 points. With the exception of Alappuzha and Thrissur, the CSR in all districts of the state remained well above 950 in 2011.



Tamil Nadu

CSR 942 2001

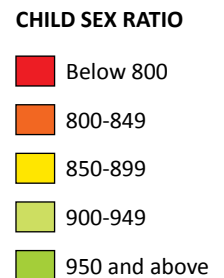
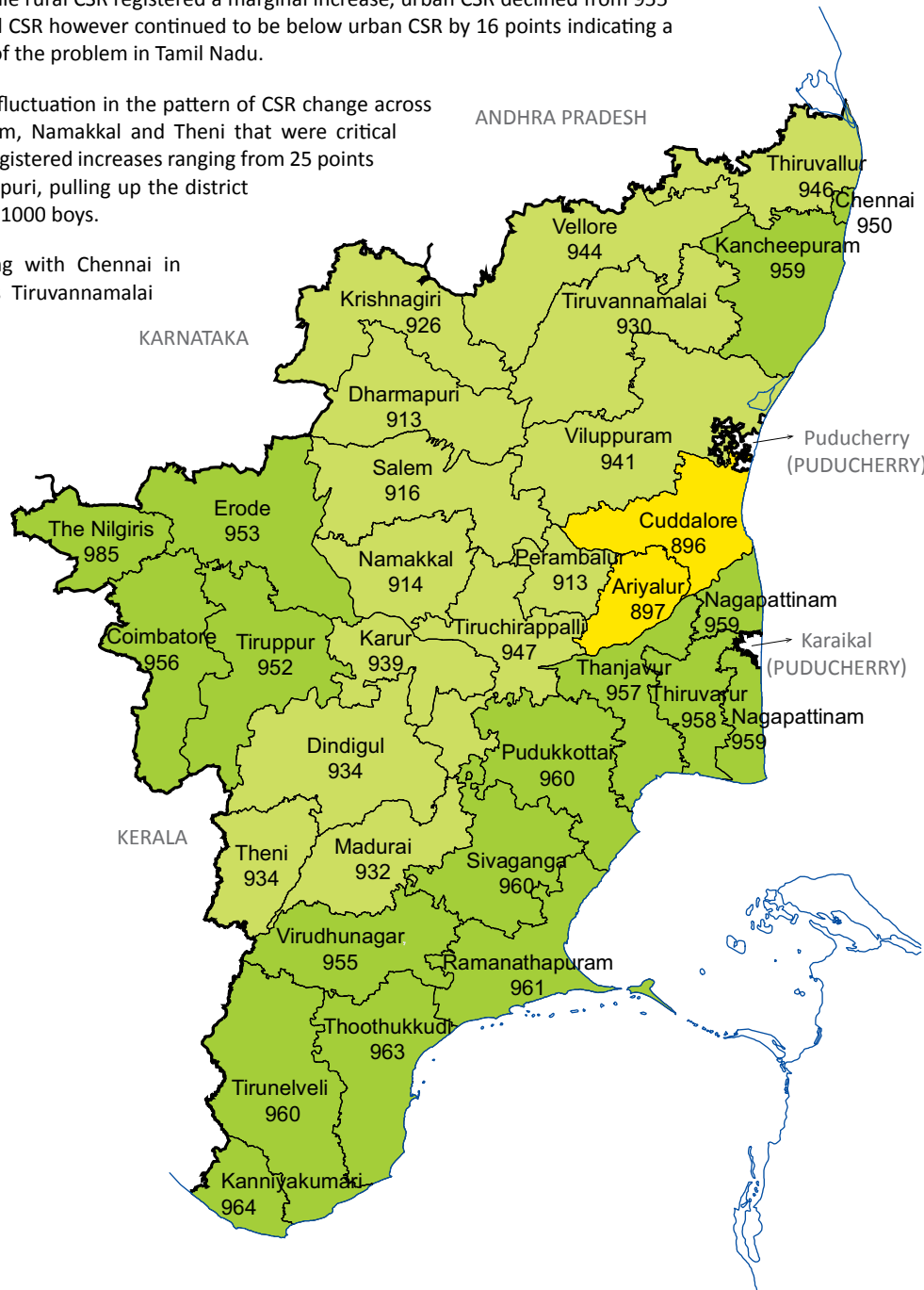


Tamil Nadu CSR 943 2011

At 943 girls for every 1000 boys, Tamil Nadu recorded a one point increase in CSR between 2001 and 2011. During this period, while rural CSR registered a marginal increase, urban CSR declined from 955 in 2001 to 952 in 2011. Rural CSR however continued to be below urban CSR by 16 points indicating a predominantly rural nature of the problem in Tamil Nadu.

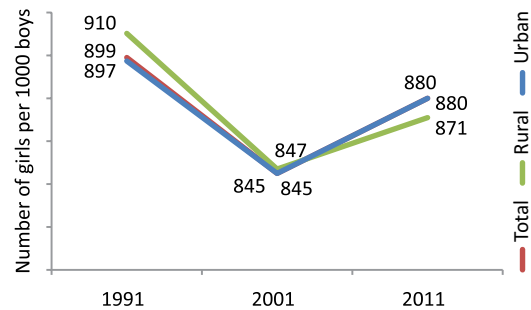
The map reflects significant fluctuation in the pattern of CSR change across the state. Dharmapuri, Salem, Namakkal and Theni that were critical districts in 1991 and 2001, registered increases ranging from 25 points to over 87 points in Dharmapuri, pulling up the district CSR levels above 900 girls to 1000 boys.

On the other hand, starting with Chennai in the north, districts such as Tiruvannamalai, Viluppuram, Perambalur, Ariyalur and Cuddalore registered declines in CSR. These districts form a contiguous cluster, with Cuddalore and Ariyalur emerging as the new epicentres of the problem in the state; a fall by over 50 points, pulling the CSR below 900 in these districts.



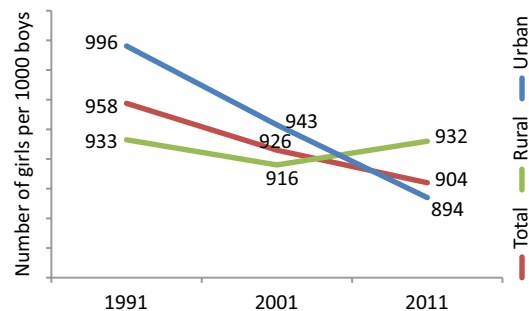
Union Territories

Child Sex Ratio (0-6 years)
Chandigarh



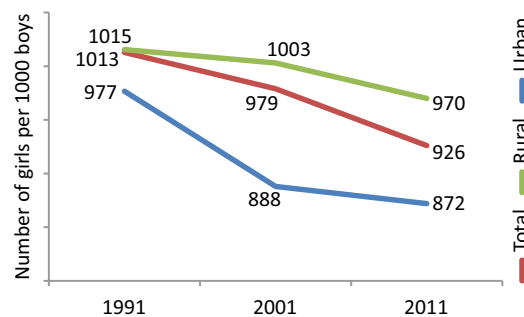
The CSR for Chandigarh reflected much the same trends as its neighbours Punjab and Haryana. For 2011 the CSR increased to 880 girls for 1000 boys from the 2001 level of 845 but still remained below the 1991 ratio of 899. Urban and rural ratios more or less present the same picture as the Union Territories (UT) average. Overall, despite the increase, the CSR in Chandigarh continues to be well below normal levels.

Child Sex Ratio (0-6 years)
Daman & Diu

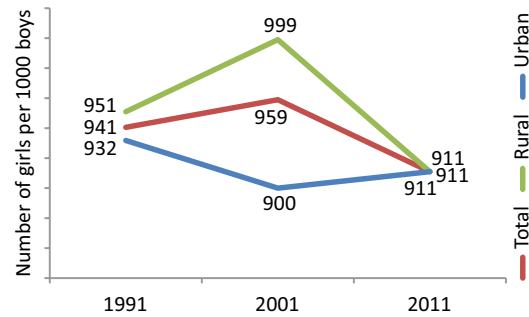


Conversely, the CSR for two coastal UTs of Daman and Diu and Dadra and Nagar Haveli registered a downward trend. It has steadily fallen over the two decades, with a drastic decline registered especially in Dadra and Nagar Haveli from a desirable 979 in 2001 to a very low 926 in 2011. Urban CSR in Daman & Diu dropped sharply by 49 points to below 900, while rural CSR increased by 16 points. In Dadra & Nagar Haveli, both urban and rural CSR declined. Rural CSR fell from an impressive 1003 girls per 1000 boys to 970. Urban CSR fell further from the 2001 level continuing to be below 900.

Child Sex Ratio (0-6 years)
Dadra & Nagar Haveli

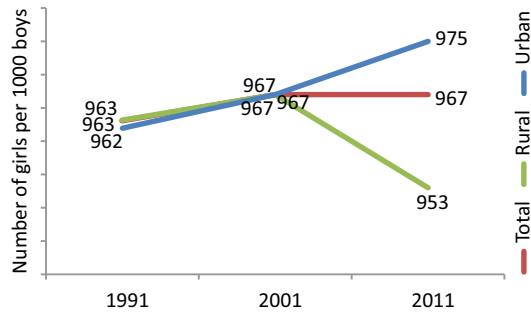


Child Sex Ratio (0-6 years)
Lakshadweep



Notably, the island UT of Lakshadweep has also registered an adverse CSR of 911 in 2011 down from the desirable CSRs over the last two decades. While the CSR in urban areas has increased since 2001, the drastic decline in rural ratios by 88 points signals a disturbing trend in the UT.

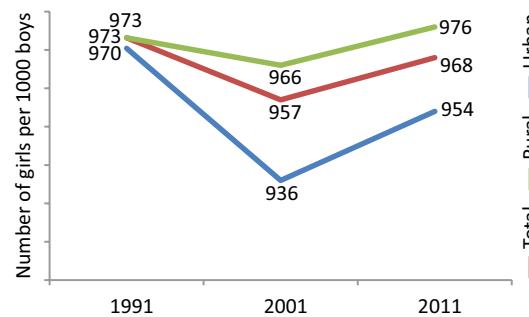
Child Sex Ratio (0-6 years)
Puducherry



The UT of Puducherry on the other hand, reflects one of the best CSRs in the country at 967. The trend has remained in the normal range over the last two decades. While urban CSR increased by 8 points, rural CSR dipped by 14 points.

In Andaman and Nicobar Islands the CSR in 2011 made a recovery with the UT average and the urban and rural ratios increasing in the last decade. Rural CSR in 2011 exceeded the level recorded in 1991.

Child Sex Ratio (0-6 years)
Andaman and Nicobar Islands



Law Prohibits Gender Biased Sex Selection

The Pre-Natal Diagnostic Techniques (PNDT) (Regulation and Prevention of Misuse) Act came into force in 1994 to regulate the use of diagnostic techniques capable of sex selection. Subsequently, it was amended in 2003 to regulate pre-conception sex selection as well. The Act is now called the Pre-Conception and Pre-Natal Diagnostics Techniques (Prohibition of Sex Selection) Act.

The amended Act not only prohibits determination and disclosure of the sex of the foetus for non-medical reasons but also bans advertisements related to pre-conception and prenatal determination of sex. The Act has made it mandatory for all ultrasound clinics and other diagnostic facilities capable of sex determination, to prominently display a signboard indicating that disclosure of the sex of the foetus is illegal. Further, all such facilities have to be registered with the Appropriate Authority of the district (usually the Chief Medical Officer or the District Magistrate). The manufacturers are required to provide information to the government about the sale of ultrasound machines and other similar equipment.

Under the Act, a medical practitioner violating the Act can face, at first conviction, imprisonment up to 3 years and a fine up to Rs. 10,000. The State Medical Council can suspend the registration of the medical practitioner involved and, at the stage of conviction, can remove his/her name from the register of the Council for 5 years for the first offence and permanently for a subsequent one.



2011

Office of the Registrar General
and Census Commissioner, India



United Nations Population Fund – India

July 2014