APPENDIX A: METHODOLOGY AND DATA SOURCES

This section provides a description of the data sources and the calculations that were used in the analyses described in this report.

For some service areas and as outlined below, Guidehouse included supplemental data or performed additional calculations as necessary. For inpatient and outpatient hospital services, we used detailed paid claims expenditure data from SFY 2020, hospital Medicare cost report data for SFY 2020, and Wyoming Medicaid’s summary of SFY 2020 federal qualified rate adjustment (QRA) payments.¹ ²

The remainder of this Appendix describes the following:

- Additional data and calculations
- Calculations of recipients and expenditures
- Comparisons to benchmarks

Additional Data and Calculations

For certain categories of services, it was necessary to make adjustments to data, as follows:

Inpatient Hospital

We used the following data from Wyoming Medicaid’s SFY 2020 Qualified Rate Adjustment payment analysis, in combination with additional data from out-of-state hospitals, to estimate cost coverage and budget impacts:

- Never and fully adjusted inpatient hospital claim line items with dates of payment in SFY 2020.³ For the Qualified Rate Adjustment analysis, we inflated payments, including third-party liability (TPL), to SFY 2020 levels using the inpatient level of care inflation amounts. For this Report, we adjusted this estimated inflated payment amount to exclude TPL. We made this adjustment by multiplying the inflated payment by the percentage of the uninflated payment that non-TPL payments comprise.

- As-filed cost report data for all in-state providers and out-of-state participating providers.

¹ To accurately represent payments received by hospitals during SFY 2020, we added the Federal Share of QRA payments calculated using SFY 2019 paid claims data to the SFY 2020 inpatient and outpatient hospital data.
² Due to different extraction dates from the Wyoming Medicaid claim system, inpatient and outpatient hospital payment amounts do not match totals displayed in WDH’s SFY 2020 Annual Report.
³ Never and fully adjusted claims have a claim status of 0 or F.
• Federal share of Wyoming Medicaid’s actual SFY 2020 QRA payments (made to hospitals in SFY 2020).

In the cost calculations, we also included estimated costs for medical education and capital. We estimated inpatient hospital costs for providers for which we did not collect cost report data by using the average cost-to-charge ratio from other providers with available cost report data.

Unless indicated otherwise, expenditures and cost coverage provided in the inpatient hospital narrative represents in-state and out-of-state participating providers.

**Outpatient Hospital**

To estimate cost coverage and budget impacts for this Report, we used Wyoming Medicaid’s SFY 2020 Qualified Rate Adjustment (QRA) payment analysis, in combination with additional data from out-of-state hospitals. We used the results of Wyoming Medicaid’s SFY 2020 QRA payment analysis as follows:

- Never and fully adjusted outpatient hospital paid claims line items with dates of payment in SFY 2020.
- Cost report data (as-filed 2019 cost reports) used for the analysis of inpatient hospital services.
- Federal share of Wyoming Medicaid’s actual SFY 2020 QRA payments (made to hospitals in SFY 2020).

We estimated outpatient costs for providers for which we did not collect cost report data by using average cost-to-charge ratios from providers with cost report data.

**Benchmarking Analyses**

The benchmarking study provides analysis that can be informative in basing decisions regarding reimbursement levels by comparing Wyoming Medicaid rates to other benchmarks. As part of the process of examining reimbursement for each service area, WDH assessed payment levels and methodologies. The SFY 2020 Benchmarking Study compares Wyoming Medicaid rates to those of six surrounding states and Medicare, and to average payment amounts made by commercial payers, where possible. To perform these comparisons, WDH first determined the most frequently billed procedure codes and the codes with the highest total expenditures in each of the service areas with fee-schedule based reimbursement rates. We identified the top 20 procedure codes for each service area by expenditures and by volume (paid units). For home health and hospice services, we used the top revenue codes. Codes billed for drugs and anesthesia were not considered in the analysis because reimbursement methodologies vary widely across states, Medicare, and commercial payers.

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4 Some services areas have fewer than 20 distinct procedure or revenue codes.
Then, WDH determined reimbursement rates for comparable services in other states and Medicare. For each code, WDH calculated Wyoming’s rate as a percentage of the comparison rate (by dividing the Wyoming Medicaid rate by the relevant benchmark rate) and then took the average value for the top codes. The complete analyses for comparisons to other states and to Medicare are included in Appendix B.

**Other Medicaid Programs**

WDH performed rate comparisons to fee-for-service Medicaid rates paid in the neighboring states of Colorado, Idaho, Montana, Nebraska, South Dakota, and Utah. To obtain data for this comparison, WDH identified fee schedules and provider communications publicly available on these states’ websites.

**Medicare**

Medicare provides annual payment adjustments for many services, including inpatient and outpatient hospital, skilled nursing facility, and home health based on inflation indices called “market baskets,” which measure the prices that providers must pay for the goods and services they purchase to enable them to care for patients. The market basket includes employee wages, equipment, and overhead expenses. Medicare annually updates rates for other service areas using another inflation index – the Consumer Price Index (CPI). Annual Medicare rate adjustments also factor in adjustments to maintain budget neutrality and other volume assumptions for some services, such as physician and outpatient hospital services. Appendix E contains a summary of health care inflation indices, including an explanation of the CMS Market Basket indices.

WDH compared Wyoming Medicaid rates to Medicare rates using Wyoming-specific Medicare rates where applicable. WDH used the calendar year (CY) 2020 Medicare fee schedules posted on the Medicare website to obtain FFS rates for ambulance, durable medical equipment, prosthetic, orthotic and supply (DMEPOS), home health, hospice, laboratory, behavioral health, physician, developmental center, and vision services. Additional analyses were needed to determine Medicare rates for home health services in Wyoming: we calculated the average Medicare home health visit rates in Wyoming by identifying the average Wyoming Wage Index Budget Neutrality Factor and the Rural Add-On.

WDH determined the percent of Wyoming’s Medicaid rate to the Medicare rate for each procedure code, where possible. A percentage less than 100 indicates the Medicaid rate is less than the Medicare rate; a percentage more than 100 indicates the Medicaid rate is higher than the Medicare rate. Appendix D describes Medicare’s specific reimbursement methodologies for the service areas compared in this report.

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5 WDH used Wyoming-specific Medicare fee schedules for the following service areas: ambulance, behavioral health, developmental center, durable medical equipment, prosthetic, orthotic and supply (DMEPOS), laboratory, physician, and vision. Medicare does not produce Wyoming-specific fee schedules for ASC or hospice.

6 Medicare updates rates on a CY basis while Wyoming Medicaid updates rates on an SFY basis; therefore, we compared Medicare rates from CY 2020 to Wyoming Medicaid rates from SFY 2020.

7 FFS Medicare does not normally cover routine vision services, such as eyeglasses and eye exams, but it may cover some vision costs associated with eye problems that result from an illness or injury.
Commercial Payers

WDH compared Wyoming Medicaid rates to average payments for each using 2019 commercial insurance claims data from Truven MarketScan. For services for which Medicaid reimburses using a fee schedule, we calculated a benchmark using the average amount allowed for the same procedure codes. Truven MarketScan data is constructed from privately insured paid medical and prescription drug claims. The database includes claims from self-insured and fully insured health insurance plans from a total of more than 350 payers nationwide, including commercial insurance companies, Blue Cross and Blue Shield plans and third-party administrators. To perform the analysis, we identified paid claims for in-network services in Wyoming based on patient location of residence. Additionally, we excluded claims that were part of a capitation arrangement. We then calculated average rates for specific sets of CPT / HCPCS and revenue codes by reported provider type and setting.

8 Calendar year 2019 was the most recent year of data available. We removed claims with a paid amount of $0 from our analysis.
9 Truven MarketScan does not include claims for dental or vision services.